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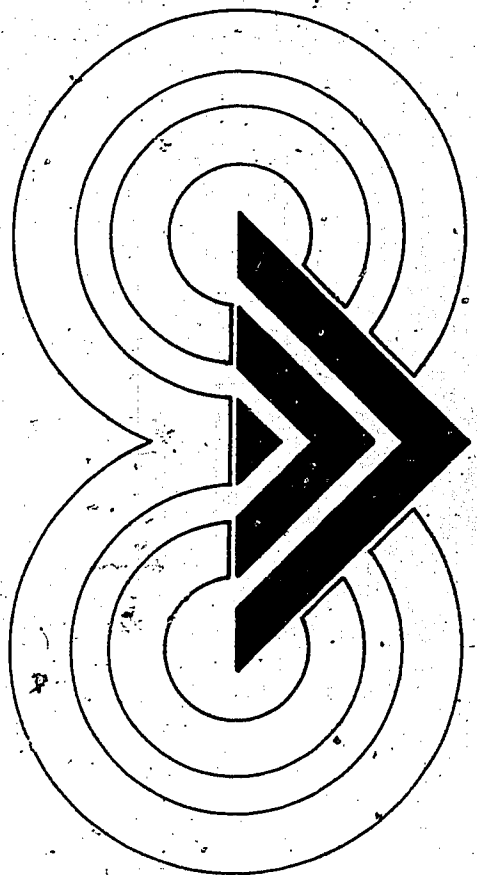
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## ABSTRACT

Proceedings of a workshop conducted by the Western Council on Higher Education for Nursing include: patterns of assessment of experiential learning (John R. Valley); physical assessment of ethnic people of color (Julie Sykes); introduction and integration of health assessment in the associate degree phase at Brigham Young University College of Nursing (Lana B. Riddle); health assessment content in the baccalaureate program at the University of Utah (Margaret Adamson); health assessment in the baccalaureate program for registered nurses at California State College, Sonoma (Vivian Malmstrom); and the nurse practitioner: graduate level (Marie Scott Brown). (Author/MSE)

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# INNOVATIONS IN NURSING CURRICULA

## Proceedings of a Workshop for Nursing Faculty

JANUARY 12-13, 1976  
SAN DIEGO, CALIFORNIA

U.S. DEPARTMENT OF HEALTH,  
EDUCATION & WELFARE  
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WESTERN INTERSTATE COMMISSION  
FOR HIGHER EDUCATION

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The Western Interstate Commission for Higher Education (WICHE) is a public agency through which the thirteen western states work together to:

- \* Increase educational opportunities for westerners.
- \* Expand the supply of specialized manpower in the West.
- \* Help universities and colleges improve both their programs and their management.
- \* Inform the public about the needs of higher education.

## WCEN

The Western Council on Higher Education for Nursing (WCEN) was organized under WICHE auspices in January 1957 and serves the following functions:

- \* Recommend to the Commission policies related to education and research.
- \* Provide a medium for exchange of ideas and sharing of experiences among (1) western institutions of higher education that offer nursing programs leading to the associate, the baccalaureate, or a higher degree, (2) their cooperating clinical agencies, and (3) certain government agencies concerned with nursing education.
- \* Undertake cooperative planning for the systems of nursing education within the western region under the auspices of the Commission.
- \* Identify and provide a means for studying problems in nursing and nursing education which need cooperative study.
- \* Stimulate research in nursing within colleges, universities, and health care facilities in the western region.
- \* Provide information for members of nursing services and faculties in the West.
- \* Encourage the increased participation of ethnic minorities and men in nursing in the West.
- \* Encourage discussion with other disciplines concerned with health issues and recommend ways to facilitate optimal utilization of nurses in health care delivery.
- \* Initiate action to resolve problems and move nursing forward.

Membership is open to each accredited college and university in the West that offers a program in nursing leading to the master's and higher degrees, baccalaureate degree, or associate degree, and to such institutions offering graduate programs in public health and in continuing education to nurses. As of July 1, 1976, there were 163 member institutions in the Council.

Each member institution is represented in WCEN by (a) the head of the nursing school, (b) a faculty member from each program leading to a degree in nursing, (c) a nurse from a designated clinical agency, and, if applicable, (d) a faculty member from the continuing education program. These representatives plan their programs and activities under the coordination of five steering committees within the board framework of the Council's functions.

# INNOVATIONS IN NURSING CURRICULA

## PROCEEDINGS OF A WORKSHOP FOR NURSING FACULTY

January 12-13, 1976

San Diego, California

THESE PROCEEDINGS ARE FROM A SELF-SUPPORTING WORKSHOP SPONSORED BY THE CURRICULUM AND TEACHING STEERING COMMITTEE OF THE WESTERN COUNCIL ON HIGHER EDUCATION FOR NURSING

WESTERN INTERSTATE COMMISSION FOR HIGHER EDUCATION

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## PREFACE

This publication contains the papers that were presented at the "Innovations in Nursing Curricula" workshop, held in San Diego, California, on January 12 and 13, 1976.

Fifty-two nurse educators, representing associate, baccalaureate, and graduate degree programs from 10 western states attended the workshop. The names of the participants are at the end of this book.

The WCHEN Curriculum & Teaching Steering Committee sponsored this first workshop offered under the new WCHEN structure. Committee members planned the workshop to meet constituents' requests in line with WCHEN goals.

The committee appreciated the time and thought that each of the speakers devoted to the presentation. It is the hope of the committee that those who attended the workshop and those who read these papers will gain new insights and knowledge that can be translated into action in curriculum development and student evaluation.

### Curriculum & Teaching Steering Committee 1976

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## PATTERNS OF ASSESSMENT OF EXPERIENTIAL LEARNING

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The members of the WCHEN Curriculum & Steering Committee are to be congratulated for focusing on innovations in nursing curricula and for giving particular attention to the assessment of experiential learning. Apparently, many educational currents are about to converge, with the result that education as we have known and experienced it will be different in the future, possibly reflecting tendencies that began to emerge around 1970. Certainly our society in general reflects profound dissatisfactions. These social tensions, coupled with what we have learned about how to expand educational outreach, with what we have learned about how to assess learner needs and interests, and with what we have learned about how to design and implement satisfying programs, suggest that the educational sector of our society has been alerted to the need for change and that it is prepared to change.

More recently, with the energy crisis and the economic recession, we have also become more conscious of the economics of education. Slowly, and in some instances painfully, we are having to learn to conserve our resources to reduce waste and to increase our efficiency in all segments of the economy, especially in the field of education. Education is not only in severe competition with other governmental services in public budgets, but also in competition with necessities such as food, fuel, and shelter in individual and family budgets.

Therefore, in addition to previous, established sound educational rationales for experiential education, there are now special urgencies in the call for providing opportunities for individuals to build on their previous educational accomplishments, in our indication that we need to use all educational resources, not just the classroom, and in our need to fit education to the student. The assessment of experiential learning has emerged as a very significant and practical problem area in higher education in general. The Commission on Non-traditional Study (1973) recommended that "New devices and techniques should be perfected to measure the outcomes of many types of non-traditional study



and to assess the educative effect of work experience and community service." In scheduling this workshop, the planners foresaw that in the field of nursing, there were not only general issues about assessing experiential learning, but also special concerns peculiar to nursing.

This paper is divided into two major sections. The first section provides an overview of the Cooperative Assessment of Experiential Learning (CAEL) project. The second discusses patterns of assessment for experiential learning. Discussion of CAEL will provide a context for the second section of the paper.

### I. The CAEL Project

CAEL was began in 1974, when nine colleges and universities, and later a tenth institution, joined with Educational Testing Service (ETS) in a project of focused research and development work concerned with the assessment of experiential learning. The cooperating institutions were Antioch College; the California State University and Colleges represented by San Francisco State University; the Community College of Vermont; Empire State College; Florida International University; the Massachusetts State College System represented by Framingham State College; Metropolitan State University; New College of the University of Alabama; and Thomas A. Edison College. These institutions agreed to work together to develop sound methods for assessing experiences and accomplishments outside the classroom.

The work of the project is directed by a Steering Committee, chaired by Morris Keeton of Antioch College. Currently, the Steering Committee consists of five members elected from colleges and universities; representatives from the original founding institutions, and three other prominent educators. The project was initially funded by the Carnegie Corporation of New York. Currently, it is being supported by the Fund for the Improvement of Postsecondary Education, the Ford Foundation, and the Lilly Endowment, and with continued Carnegie funding.

Provision has been made for degree-granting institutions and other associations and agencies to join the project through membership in the Assembly. This body meets twice yearly and serves as a forum for the airing of concerns, problems, and issues, and for communicating the progress, the status, and the findings of various tasks undertaken by CAEL. Some 200 colleges and universities and other institutions and agencies hold membership in the Assembly. The Assembly also serves as a working group of institutions through whom various products developed by CAEL can be tried out, local research and development initiatives can be undertaken, and study of systematic approaches to concerns

relating to experiential education can take place.

During the first year of CAEL, the Steering Committee established four major priority areas to guide the work of the project: (1) assessing achievement of interpersonal skills, (2) use of portfolios in assessment of non-sponsored learning, (3) assessment of learning outcomes of work experience, and (4) use of expert judgment in assessing learning outcomes.

Within these priority areas, seven tasks were specified, and by the end of the first year CAEL had produced seven working papers. These reports are currently being reviewed and critiqued on college campuses throughout the country and tried out by students and faculty in operational settings. The final reports will be published later this year. I believe these reports are valuable resources for anyone engaged in or directing experiential education programs; thus I will comment on each of them to give a brief idea of their potential usefulness.

Working Paper No. 4: The Learning and Assessment of Interpersonal Skills:  
Guidelines for Administrators and Faculty.

The report begins with a survey of the reasons for academic interest in the development and assessment of interpersonal competence and a discussion of the problems and difficulties associated with education for interpersonal competence. In addition to problems of semantics, the authors point to the complexity of the subject, its close link to personality characteristics, and the major differences in the roles of academic institutions in the field. They discuss the range of interpersonal competence, including nine major categories within this skill area: mentoring, managing, leading, negotiating, instructing, supervising, consulting, persuading, and communicating. Each of these major categories includes from 8 to 14 subbehaviors. This segment of the report alone is worthwhile for anyone engaged in developing programs or performing assessments in interpersonal skills area.

The report also provides an analytic framework for developing and assessing interpersonal skills. The authors advance the view that interpersonal skills are behaviors that can be learned via formal training in educational institutions or the experiences of life activity, that the skills have transferability, and that they are instrumental to the problem-solving process. They argue for placing communicative behaviors at the center of a multidimensioned interpersonal skills domain. Further, they discuss experiential learning situations, identify 11 variables of situations affecting the experiential learning of

interpersonal skills, and suggest procedures for finding the combination of variables that sponsors of experiential learning programs might find useful. They offer a kind of do-it-yourself manual for developing sponsored experiential learning programs: (1) identify student goals; (2) develop individualized learning plans; (3) select experiential learning site; (4) specify methods and procedures for completing educational plan; (5) prepare for evaluation of learning outcomes; and (6) develop guidelines for granting credit.

Additionally, the report discusses assessment strategies and offers the concept of a core program--a series of steps to be followed by all students seeking academic credit for experiential learning of interpersonal skills.

Knowledgeable readers will appreciate that the counsel offered here has more general applicability as well. The discussion indicates that there are at least nine different assessment techniques that can be applied to assessing interpersonal skills. It recommends that the selection of particular techniques can be guided by criteria such as (1) available resources, (2) social context, (3) psychometric standards, (4) how direct the information is, (5) what time span is covered by the information, and (6) who supplies the information. It suggests that a typical program for the establishment of interpersonal skills include experience checklists, role experience summaries, interviews, documentation of accomplishment, and ratings. The core program lists 16 steps that begin with the student inquiring about the program; the use of an experience check list; a role experience summary, interviews, a portfolio, and ratings. The major components are described and illustrated. The core program might be supplemented by a topical essay, objective tests of knowledge, and content analyses (to confirm an intellectual integration of experience) and/or group discussion, simulation, and work sample (to confirm creditable competence by asking the student to demonstrate it).

#### Working Paper No. 5: The Learning and Assessment of Interpersonal Skills:

##### Guidelines for Students.

This report is a companion piece of Working Paper No. 4, but it is addressed to the student rather than to the faculty audience. In the introduction, the distinction between prior learning and sponsored learning is explained, and there is an explanation of how the manual can assist students. There is a broad discussion of experiential education, the CAEL project, and definitions relating to interpersonal skills and their importance. Then follows an analytic framework for developing and assessing interpersonal skills

which parallels that in Working Paper No. 4.

The report continues to discuss strategies for interpersonal skills development, such as determining personal and career goals, identifying ways to achieve goals through experiential education, and developing an educational plan to provide learning and facilitate assessment and evaluation. There is an extended discussion directed to preparation for assessment that includes familiarization with the techniques proposed for the core program in Working Paper No. 4. Examples include the check list, role experience summary, interview, letters of reference, ratings, topical essay, pencil and paper tests, group discussions, simulations, work sample, and content analyses.

Working Paper No. 6: A Guide for Assessing Prior Experience through Portfolios

The introduction to this paper includes that the portfolio is not only a dossier of information about a student's past experience and accomplishments, it is also a "process by which prior experience can be translated into educational outcomes or competencies, documented, and assessed for academic credit or recognition," and that the process is emphasized in the manual. The manual is based on information gathered from visits to 30 institutions and from a mail survey of 16 institutions. The information shows that "portfolio procedures...do not vary according to the type of institution," and that "portfolio procedures tend to be influenced more by characteristics of the student clienteles, institutional philosophy, and financial constraints than by type of program." The most prevalent types of prior learning, in order, were (1) work experience, (2) noncredit course, (3) community work, (4) travel, (5) hobbies, and (6) homemaking.

The eight-stage model of portfolio assessment includes facilitating portfolio assessment; identifying prior learning experience, expressing prior learning outcomes, articulating prior learning outcomes, documenting prior learning activities, measuring extent and level of prior learning outcomes, judging the learning outcomes, and evaluating prior learning outcomes.

The report suggests six criteria that should characterize prior learning outcomes if they are to be considered for credit. The prior learning should lend itself to measurement and evaluation, be at the level of undergraduate achievement as defined by the institution, be applicable outside the specific job or context in which it is learned, have a knowledge base, imply a conceptual as well as a practical grasp of the knowledge base, and show some relationship to degree goals and or lifelong learning goals.

Working Paper No. 7: A Student Handbook on Preparing a Portfolio for the Assessment of Prior Experiential Learning

Following an introductory section that includes an explanation of assessment of prior experiential learning, the rationale for recognizing prior learning, several case illustrations, and an overview of procedures, the handbook indicates how the student can identify and describe what has been learned, beginning with the preparation of an autobiography. The handbook then suggests that students should relate what has been learned to what they want to learn. It provides help in handling documentation by discussing standards of documentation. It discusses various techniques colleges might use to measure learning, such as situational observations, product assessments, oral interviews, written examinations, performance tests, and simulations. It discusses how to request a specific amount of credit, which is really a discussion of how colleges decide what amount of credits might be awarded. Included in the appendix is a list of some 120 colleges that grant credit for prior experiential learning.

Working Paper No. 8: A Task-Based Model for Assessing Work Experience

The paper focuses on a general model called the Work Assessment Model for assessing competencies in occupational fields. The model proceeds through eight stages: select occupational fields for assessment, identify competencies, develop task inventory, verify that the student has had work experience, relate competencies to the curriculum and to the educational goals of the students, measure occupational competency, evaluate and synthesize measurement results, and determine amount of credit and the level of placement.

By the way of illustration, the model is applied to fields of data processing, law enforcement, and secretarial science. These fields were selected because studies show that postsecondary institutions had sensed a need for help in these areas and that prototype assessment instruments had been developed on the basis of compendia of task descriptions or occupational competencies. The report discusses identifying occupational competencies through job and task analysis and includes a hypothetical cost analysis.

Working Paper No. 9: A Student Guide to Learning through College-Sponsored Work Experience

The guide is intended for students about to choose a college-sponsored work experience--to help in making the selection, to help prepare for the experience, and, if already engaged in an experience, to help derive maximum



learning from it. The guide suggests 11 basic steps to a useful learning experience organized as follows: Choosing the Experience: (1) take stock of your general goals, (2) consider the work options available; Preparing for the Learning Experience: (3) define your principal task and duties, (4) describe your specific learning objectives, (5) inventory basic preparation, (6) devise a learning plan; Involvement in the Learning Experience: (7) orient yourself to the work situation, (8) amend your learning plan, (9) monitor your learning; Synthesizing the Learning Experience: (10) assess your learning outcomes, and (11) establish new learning objectives.

Working Paper No. 10: The Use of Expert Judgment in the Assessment of Experiential Learning

The report begins with a discussion of methodological problems and issues related to use of judgment for assessment, including the role of the assessor, the problem of standards and levels of competence, the issue of validity and reliability, the sources of error in assessment, and the evaluation of assessment. Then follows an examination of the interview and other oral procedures such as oral examinations, panel interviews, and leaderless group discussions. Included are suggestions on how to conduct an interview, interview application to assess leadership competency in a volunteer organization, and application for assessing home management competency. The report includes an extended discussion of product assessment, including a model of product assessment in the visual arts adapted from the College Board Advanced Placement Examination in Studio Art. There is also a treatment of performance assessment, including work samples, situational tests, simulations, and prepared performances. The report also covers a discussion of the assessment of free-response written material such as essays, portfolios, logs, diaries, and journals.

The paper presents a seven-step model for the application of expert judgment to assessment of sponsored experiential learning: (1) program definition, (2) specification of learning outcomes, (3) establishment of assessment procedures, (4) formative assessment--to monitor learning progress of student, (5) summative assessment--to determine if competence has been attained, (6) evaluation of assessment, and (7) revision.

The various working papers described earlier represent a major part of the work done in 1974-1975. In addition to the central research and development work reported in the working papers, CAEL supported the research

initiatives of 20 local colleges and universities that were related to the four priority areas. An external jury selected five of these projects for extension and application on other colleges campuses in 1975-1976. This work is currently in progress.

What is the current thrust of work in CAEL? There are four primary items.

1. The research and development work is being validated by testing the experiential materials at college and university campuses by faculty and students. This work is now being applied at about 70 institutions throughout the country.

2. Twelve institutions are engaged in the development of operational models of experiential learning programs (Antioch College, California State University and Colleges, Community College of Vermont, Delaware County Community College, Florida International University, Memphis State University, Metropolitan State University, San Francisco State University, Union College, University of Kentucky, University of Oregon, and Webster College). The focus of this effort is on the problems of putting new assessment procedures into place in operating educational programs. All models will share three characteristics: utilization of a systems approach to implementation problems, focus on one of two major issues: developing standards or cost/effectiveness of assessment procedures, and focus on one of three CAEL priority areas: assessment of interpersonal skills, assessment of learning outcome of work experience, or use of the portfolio to assess non-sponsored learning. This project is expected to result in greatly strengthened expertise at a dozen institutions, techniques for implementing improved assessment programs on any campus, published models of institutional applications of assessment procedures, and actual use of newly developed procedures at a number of institutions to the benefit of students.

3. Sixteen institutions are engaged in the faculty development program. This activity which will proceed through three stages of planning, development, and training, and will result in a corps of about 300 individuals, from approximately 100 institutions, who can serve as trainers for those in other institutions. The aim of the faculty development program is to improve the ability of the faculty to offer more experiential learning and evaluate and certify the results of experiential learning. Thus, the project is aimed at improving the outlook, effectiveness, understanding, and skills of faculty



who will conduct the learning, be assessors or supervise the assessors, and act as those who provide credentials.

4. The final major activity is the reorganization of the CAEL assembly. Steps will be taken in 1975-1976 to formally incorporate the Assembly to make it an institutional membership association of a more permanent character, which will be governed by representatives elected from and by Assembly membership.

In a sense, then, a description of the work of the CAEL project is responsive to the theme of this workshop, i.e., patterns of assessment of experiential of experiential learning. Let me elaborate by referring back to the priorities of CAEL. These priorities suggest four interlocking dimensions that effectively pattern the assessment of experiential learning:

1. We must increase our understanding of various human skills and competencies and look at the problem of assessment from the perspective of particular skills--hence the priority area of assessing interpersonal skills.

2. We must increase our understanding of instrumentation or process whereby we gather information on the basis of which assessments can be made--hence the priority area focused on the portfolio.

3. We must increase our understanding of ways that human judgments can be improved because of the critical dependence of assessments on expert judges--hence the priority area concerned with expert judgment.

4. We must increase our understanding of the multitudinous forms of experiential learning--hence the priority area concerned with assessing learning outcomes.

Thus, different patterns of assessing experiential learning emerge with the dimensions of (1) identification and definition of the skills or competencies to be assessed; (2) instrumentation or processes used for assessment; (3) selection, training, and functioning of assessors; and (4) the experiential learning setting.

## II. Patterns of Assessment of Experiential Learning

In the balance of my discussion I shall concern myself with patterns of assessment of experiential learning that can be discerned by looking at selected operational programs. Here, one of the early efforts of the CAEL project provides some assistance. The project conducted a survey of Current Practices in the Assessment of Experiential Learning in the spring of 1974. All two-year and four-year colleges and universities were contacted by

questionnaire, and about 50 institutions were visited by the CAEL staff. Some 400 replies were received, of which about 350 reported pertinent programs.

A major distinction can be made between prior and sponsored experiential learning programs. "Programs to credit prior learning are defined as those which attempt to recognize learning that has resulted through experience before the student sought to enroll for college programs or which occurred when he or she enrolled though not under the supervision and auspices of the institution." This category includes such things as work experience, volunteer work, travel, military service, and homemaking. "Sponsored programs, on the other hand, are those programs which are established under the direction of a college or university or with their aid and cooperation for the express purpose of providing a particular kind of learning experience considered to be of value in the student's program and deemed by the institution beforehand to be worthy of college credit." This category includes internships, cross-cultural learning opportunities both within and outside the U.S., community aid programs, cooperative programs, and the like. Of those institutions reporting one or the other types of experiential learning programs, 97 percent indicated they had some type of sponsored learning programs, whereas 40 percent said they awarded credit for some kind of prior learning.

Incidentally, other writers are attempting to distinguish prior from sponsored experiential learning programs by referring to the latter as experiential education and reserving experiential learning for the former situation.

A survey referred to earlier found several types of programs for awarding credit for prior learning.

1. A faculty-based model, in which initiative for working with the student in identifying potential credit and assessing learning is a faculty responsibility. This model tends to operate in institutions that express course requirements in terms of courses or in competency-based programs where institutions specify a set of competencies that are common to all students or unique to particular majors, e.g., Florida International University.
2. A student-based approach in which the student takes initiative by making a self-assessment. This approach is more likely to be related to competency-oriented degree programs that are highly individualized, e.g., Metropolitan State University.

3. Institutions that treat award of credit in a supplementary auxiliary fashion or exceptional basis; these are not yet true experiential learning programs.

It is of some importance to understand that the term assessment, as used with regard to experiential learning, encompasses six fairly distinct stages.

1. Identify the type of learning or competencies acquired through life experience or the types of learning or competencies that are incorporated in an institutionally sponsored program of experiential learning. This is a critical state for the assessment of experiential learning, since the first obvious requirement is to know what competencies and skills there are to be assessed. It is also a critical and typically very difficult step for a student seeking credit for learning prior to enrollment.
2. Articulate such learning or competence to the educational goals or academic degree of the student. Some institutions may recognize exceptions, but in most instances the validity of a learning experience for credit purposes depends upon a demonstrated relationship to an accepted educational goal. This step is especially critical to individualized degree programs and in the conception of institutionally sponsored off-campus programs.
3. Document the fact that the student has in fact participated in such learning experience. In institutionally sponsored programs, documentation often simply involves a personal verification. Documenting a learning experience prior to enrollment may take many forms such as certificates, letters, and licenses.
4. Measure the extent and character of the knowledge or skill acquired. This is the one stage of the six that actually involves some form of quantification, although quantification may or may not involve any type of instrument and may amount of nothing more than a qualitative judgment such as good or satisfactory.
5. Evaluate whether the knowledge or skill meets an acceptable standard and how much credit and/or recognition is awarded. Evaluation is not always distinct from measuring, since measuring can sometimes mean simply comparing a student's accomplishments with previously evaluated standards, but often measuring and evaluating are distinct stages, especially in the sense that evaluation implies some judgment as to how much the learning is worth in academic currency.

6. Transcript the credit or other appropriate description of the learning and its assessment. Even when a specific amount of academic credit is awarded for experiential learning, the credit must be described on the student's permanent record in a way that is fair and equitable and in a way that communicates to interested persons what the credit represents. Because experiential learning does not come with course labels, transcription becomes an unavoidable aspect of assessment.

The approach that I propose to make to an analysis of patterns of assessment of experiential learning is as follows. First, I have selected seven programs concerned with the assessment of experiential learning. Given the substantial variation in programs that are operational, these seven have been selected for analysis not because they are typical but because they illustrate the broad spectrum of approaches being pursued by institutions today. Two of the programs are sponsored experiential learning programs, five are concerned with the assessment of prior experiential learning. Six of the seven programs end in an undergraduate degree; the seventh ends in a new professional credential that became operational for the first time in 1975 (thus, its acceptance is yet to be tested). Collectively, the seven programs incorporate the three major approaches to the assessment of learning outside the formal classroom--credit by examination; credit for noncollegiate-sponsored instruction; and credit based on expert judgment as applied through interviews, product assessment, performance assessment, and assessment of written materials.

Because my selection of experiential learning assessment programs incorporates the variety discussed above and more, on what basis can these programs be approached to search for patterns? The patterns are to be found within the major critical issues involved in any program of assessment of experiential learning. The critical issues are:

1. Who are the assessors--what is their role?
2. How is the assessment accomplished--what instrumentation is used?
3. What is assessed? What has determined what is assessed?
4. When does the assessment occur?
5. Where does the assessment occur?
6. Why is the assessment conducted?

The six critical issues provide the dimensions for analyzing the patterning of assessment of experiential learning. I would argue that, as these dimensions

reveal substantial variations in patterns from one program to another, they reflect the reality of experiential education in America today. The field is so new, the communication among practitioners is so recent and so incomplete, and the applications being made of experiential learning are so diverse that regularities, approved procedures, and standards, have yet to emerge.

Now with this in mind, let us consider pattern analysis of the seven programs.

### Patterns of Assessment of Experiential Learning

Program	Assessors and Their Roles
<p>1. U. California, Los Angeles School of Management - Undergraduate. Introduction to Individualized Experiential Education Experiential Education Field Study</p> <p>(sponsored learning)</p>	<p>Students--judge what and how they learned Faculty--academic qualities and quantities of learning experience Field Supervisor--professional qualities Independent Evaluator (Log Analyst) judges relationship of log entries and course learning objectives</p>
<p>2. Wayne State University B.A. in Social Work</p> <p>(sponsored learning)</p>	<p>Student and Field Instructor } Provide ratings on Performance Assessment Check List</p>
<p>3. Child Development Associate Consortium Credential Award System (operational 7/75)</p> <p>C.D.A. (for workers in early childhood centers) credential</p> <p>(prior learning)</p>	<p>Candidate--develops portfolio Trainer--completes report; observes candidate Parent/Community Representative--observes candidate directly and contacts parents Consortium Representative--observes candidate and certifies procedures</p>
<p>4. Antioch College, Adult Degree Completion Program (A.D.C.P.)</p> <p>(prior learning)</p>	<p>For Academic Credit: Faculty members who teach in disciplines related to field to be evaluated Students--sometimes For Work-Study Credit Center for Experiential Education</p>



Program

Assessors and Their Roles

5. NY Regents Degree--Nursing  
Associate in Science  
Associate in Applied Science

Varied For General Education Component

1. Regular nursing school, college, university instructors
2. Military service school instructors
3. Examiners of College Proficiency Examination Program, College Level Examination Program, USAFI
4. Faculty members appointed to special assessment panel
5. Faculty members who evaluate non-collegiate-sponsored instruction

For Nursing Component:

1. NY State College and University faculty members--for three basic academic areas: health communali-ties in nursing care, differences in nursing care, and occupational strategy
2. Associate Degree Nursing Educators--especially trained for Clinical Performance in Nursing Examination and staff member Regents External Degrees in Nursing

(prior learning)

6. College Level Examination  
Program

Examining Committees--usually five  
faculty members from cross section  
of colleges and universities

(prior learning)

7. Office on Education  
Credit - American  
Council on Education  
or  
Office of Noncollegiate  
Sponsored Instruction  
NY State Education  
Department

Evaluation teams consisting of college  
or university faculty members

(prior learning)

<u>Program</u>	<u>How (Instrumentation)</u>
1. University California, Los Angeles	Via Record-Reflection Log--"a document the student keeps regularly and in which learning considered by the student to be important (or the lack of it) is recorded. The record system accounts for the actual learning activities engaged in by the student, while the Reflection Section depicts the thoughts, ideas and questions, which grew out of an activity or combination of activities." Via Process-Assessment Matrix--log analyst summarizes and analyses log entries for evaluation purposes
2. Wayne State University	Via a Performance Assessment Check List used by student and field instructor (social workers employed by social agencies); identifies behaviors and activities of students, reflecting their learning in a field work practicum.
3. Child Development Associate Consortium	Several instruments used: a. Candidate-prepared portfolio--evidences of work with children indexed by competency area b. Trainer's report c. Parent/Community Representative report d. Consortium Representative observation forms
4. Antioch College	<u>Varied</u> Portfolios Oran interviews Written examinations
	Results in demonstrated learning credits



Program

How (Instrumentation)

5. NY Regents Degree - Nursing

Varied for General Education Component

1. Transcripts of college-university courses completed
2. Transcripts of military service courses completed
3. Standardized examinations
4. Oral, written, and performance examinations, and/or portfolios of literacy or artistic accomplishment
5. "Guide to the Evaluation of Educational Programs for Noncollegiate Organizations," NY State Education Department

For the Nursing Component:

1. Transcripts of college and university courses completed for area requirements in nursing or 7 examinations in core nursing academic areas
2. Clinical performance requirement via 2 1/2 day clinical performance examination

6. College Level Examination Program

1. Five general examinations measuring knowledge in broad areas of undergraduate instruction
2. Thirty-six subject examinations measuring achievement in courses taught in undergraduate colleges and universities

7. Office on Education Credit

Organizations supply the following for each course:

1. A syllabus
2. Instructional materials used, textbooks, audio-visual materials, case studies
3. Procedures for grading students and sample tests
4. Criteria and procedures for selecting instructors
5. Duration of course
6. Student record system

Program

What Is Assessed

1. University of California, Los Angeles

1. Five Broad Areas of Learning: Self-awareness, awareness of others, skill development, academic content, career understanding
2. Degree of understanding--ranging from presenting knowledge to analyzing it to applying it--activities classified as Identify, Inform, Describe, Analyze, Synthesize and Generalize, and Apply Decision-Making Skills

2. Wayne State University

Basic Educational and Performance Skills: learning patterns, work habits, values

Communication and observational skills

Problem-solving skills: problem identification, fact finding, assessment design plan of action, intervention, termination or transfer, evaluation

Five-point scale used: 1 = rarely, 5 = always

3. Child Development Associate Consortium

Six competency areas:

1. Establishment of safe healthy learning environment
2. Advancement of physical and intellectual competence
3. Support of positive self-image
4. Promotion of harmonious interrelations between children and adults
5. Coordination of child-rearing practices of home and center
6. Ability to carry out supplementary responsibilities related to children's programs

Program	What Is Assessed
4. Antioch College	<p>Elements of learning common to those of the established studies of A.D.C.P.</p> <p>Students must demonstrate knowledge which is systematic and conceptual, that goes beyond the particular to encompass general principles applicable in diverse situations</p>
5. NY Regents Degree - Nursing	<p>For general education component:</p> <ol style="list-style-type: none"> <li>1. Basic college-level competence in humanities, social sciences, natural sciences/mathematics</li> </ol> <p>For nursing component:</p> <ol style="list-style-type: none"> <li>1. Knowledge comparable to graduates of associate degree nursing programs</li> <li>2. Competence in executing technical nursing skill and judgement in the areas of planning, implementing and evaluating nursing care-- includes two simulated nursing laboratory situations, three adult patient care situations, and two child patient care situations. Candidate must perform critical elements with 100% accuracy. Some care areas are personal hygiene, vital signs, mobility, fluid, suctioning, irrigations, medications, infant feeding</li> </ol>
6. College Level Examination Program	<p>General examinations measure knowledge in English, social science--history, mathematics, natural science, humanities</p> <p>Subject Examinations measure knowledge derived from various liberal arts courses, business, medical technology--nursing</p>
7. Office on Education Credit	<p>Content of courses taught in business, industry, government, unions, police academies, and other non-collegiate settings which may be comparable in content and level to college courses</p>

<u>Program</u>	<u>When</u>	<u>Where</u>	<u>Why</u>
1. U. California, Los Angeles	While course is in progress	In campus setting	<ol style="list-style-type: none"> <li>1. To find ways to determine and document what student was actually learning in the field without the direct supervision of the instructor</li> <li>2. Provide a way to monitor the program</li> </ol>
2. Wayne State University	At conclusion of field work practicum	Field Placement Assignments	To assess student performance in field work practicum
3. Child Development Associate Consortium	Following completion of formal or informal training and at least 8 consecutive months of full-time experience working with children ages 3 to 5 in group setting	At an approved child development center where observation can be performed	To assess competence of individuals working with 3 to 5 year old children in early childhood centers; to systematize the award of CDA credential to those assessed as competent
4. Antioch College	At admission to A.D.C.P. Following one year of previous college and attainment of age 25	College campus	To establish process through which each individual's uniquely achieved education is translated by recognized experts into commonly accepted academic credit

<u>Program</u>	<u>When</u>	<u>Where</u>	<u>Why</u>
5. NY Regents Degree--Nursing	Clinical Performance Examination given on first three weekends of any month	At examination centers in NY State and four out-of-state locations; Nursing Clinical Performance Examinations administered in Albany NY only	To provide educational opportunity to men and women who, for one reason or another, are unable to attend college on a regular basis long enough to obtain a degree
6. College Level Examination Program	Monthly	At college and university test centers throughout the country	To provide a national system of credit by examination whereby individuals can demonstrate college level educational achievement without regard to how, when, or where learning took place
7. Office on Education Credit	Periodic	Business, industrial, military, union, etc., systematic and formal instructional program	To assist individuals to have their previous learning recognized and to service colleges and universities prepared to recognize previous learning no matter where acquired

What conclusions can be reached from this analysis?

1. The process of assessing experiential learning needs to begin with a definition and delineation of what is to be assessed and the purposes for which the assessment is to be conducted. Prior clarification of this issue paves the way for resolving issues of second-order priority. In the specific examples that I have described, there have been substantial differences in patterns of assessment of experiential learning that can be related to differences of objectives and purposes of the learning programs themselves.

2. Since experiential learning programs are quite varied, we can expect to find matching differences in the assessments incorporated into the programs.

3. The design of experiential learning programs should incorporate simultaneous planning for the assessment of achievement that is to result therefrom. The assessment process can provide not only feedback regarding individual student learning but also information about the functioning of the program itself.

4. Many of the techniques now being considered for assessing experiential learning depend upon the availability of staff who are skilled and competent in their use. The implication is that staff training may be an important requirement for successful experiential learning programs.

5. Experiential learning programs should consider ways to incorporate the active involvement and participation of the student to realize the potential contribution of the assessment process itself to further student learning and development.



## APPENDICES

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Address inquiries about  
CAEL material to:

CAEL  
Educational Testing Service  
Princeton, NY 08540



## Appendix 1

### A FRAMEWORK FOR AN EIGHT-STAGE MODEL OF PORTFOLIO ASSESSMENT\*

#### 1. Facilitating Portfolio Assessment

- a. Counseling
- b. Mentoring
- c. Student workshops
- d. Course in educational planning
- e. Independent counseling service
- f. Self-instructional materials
- g. Faculty workshops

#### 2. Identifying Prior Learning Experiences

- a. Time-line method
- b. Résumés
- c. Work packets and outlines

#### 3. Expressing Prior Learning Outcomes

- a. Institutional goals
- b. Competencies
- c. Taxonomies
- d. Courses

#### 4. Articulating Prior Learning Outcomes

- a. Autobiographical/intellectual narrative
- b. Thematic narrative
- c. Degree pacts or contracts
- d. Learning contracts

#### 5. Documenting Prior Learning Activities

(See CAEL Working Paper No. 6, figure 2, page 36)

#### 6. Measuring Extent and Level of Prior Learning Outcomes

- a. Product assessment
- b. Interviews and oral examinations
- c. Simulations
- d. Performance tests
- e. Essays
- f. Objective tests
- g. Self-assessment

#### 7. Judging Learning Outcomes

- a. Individual faculty member
- b. Permanent interdisciplinary faculty committee
- c. Permanent interdisciplinary faculty committee and individual faculty expert
- d. Departmental faculty committee
- e. Outside experts
- f. Alumni experts
- g. Peers
- h. Assessment team

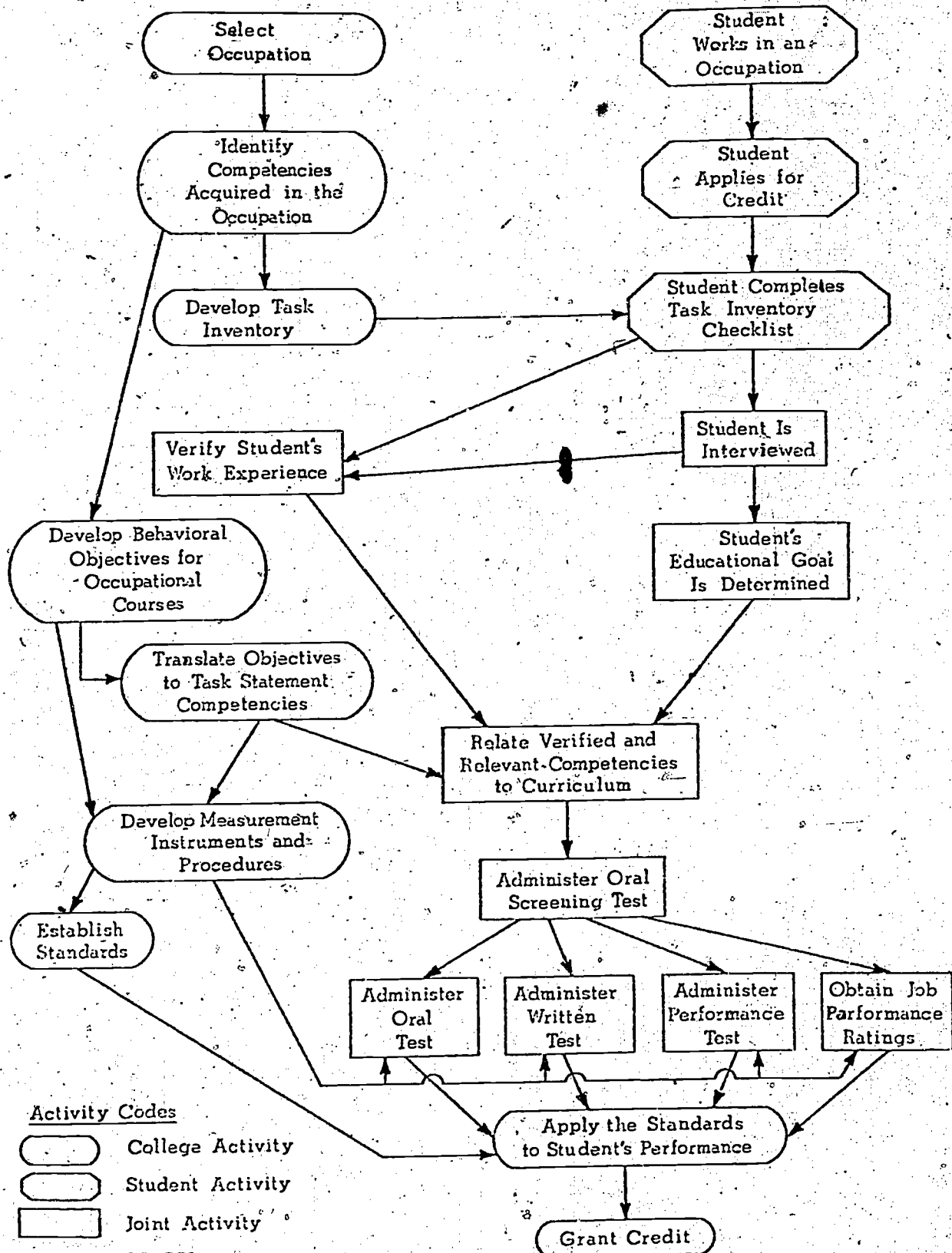
#### 8. Evaluating Prior Learning Outcomes

- a. Courses offered in the college
- b. Subject or discipline area
- c. Competencies
- d. Educational goals of student
- e. Holistic evaluation
- f. Degree-contract requirements
- g. Number of years of experience

\*From Knapp, Joan. A Guide For Assessing Prior Experience Through Portfolios. CAEL Working Paper No. 6, 1975.

## Appendix 2

### WORK ASSESSMENT MODEL FOR PRIOR LEARNING\*



\*From Sharon, Amiel. A Task-Based Model for Assessing Work Experience. CAEL Working Paper No. 8, 1975.

# Appendix 3

## RECORD AND REFLECTION LOG\*

Date \_\_\_\_\_

Office of Experimental Educational Programs  
University of California, Los Angeles

Course/  
Program \_\_\_\_\_

Code Name \_\_\_\_\_

This log should be used to record your learning experiences and the ideas you have about them. It should be filled in at the end of each of the days you are involved in your experiential learning course or program. The logs will be collected each week. Please try to be as candid as you can. Use the back of this page for additional writing space, if necessary.

I. Record or list the course/program activities and experiences you have been involved in today.

II. Reflect upon the above and, using the space below, explain those thoughts, ideas, concepts, or questions that have grown out of the activities and experiences you have recorded.

III. I would rate today's course activities and objectives as: (circle one please)

Poor Fair Good Very good Invaluable

IV. I would rate the extent to which today's course contributed to my own personal growth and development as: (circle one please)

Poor Fair Good Very good Invaluable

\*From Institutional Report No. 3, University California, Los Angeles. Evaluation & Expert Judgment. CAEL, 1975.

Appendix 4

WEEKLY HOURS SPENT IN COURSE OR PROGRAM-RELATED WORK\*

Office of Experimental Educational Programs  
University of California, Los Angeles, California 90024

Week of: \_\_\_\_\_ Course/Program \_\_\_\_\_ Code Name: \_\_\_\_\_

This is to be answered at the end of each week only as related to the course/program.

Please add up the number of hours you spent on course- or program-related work for this week:

Field experience . . . . . \_\_\_\_\_ hours.

Academic component (class) . . . . . \_\_\_\_\_ hours.

Study related to academic and field components of this course/program . . . . . \_\_\_\_\_ hours.

\*From Institutional Report No. 3, University California, Los Angeles. Evaluation & Expert Judgment. CAEL, 1975.

## Appendix 5

## PROCESS/ASSESSMENT MATRIX\*

Office of Experimental Educational Programs

Log Entry Dates \_\_\_\_\_

University of California

Name of Course/Program \_\_\_\_\_

Los Angeles, California 90024

Name Code \_\_\_\_\_

	Identify	Inform	Describe	Analyze and synthesize- generalize	Apply decision- making skills (take a course of action)
Self-awareness					
Awareness of others and environment					
Skill development					
Cognitive area (academic)					
Career understanding					
Student's themes and/or underlying patterns					
No learning	Rating of learning:			Number of hours:	
No entries	Log entries			Field	Academic
	Entry ratings			Study	

\*From Institutional Report No. 3, University California-Los Angeles. Evaluation & Expert Judgment. CAEL, 1975.



PERFORMANCE ASSESSMENT CHECKLIST (PAC)\*

The following Performance Assessment Checklist (PAC) is designed to enable us to arrive at an assessment of the student's skill in terms of performance of the described behaviors. The PAC should provide us with some clarity regarding where the student is in his or her professional development and, at the same time, should be a useful working tool in instruction for setting educational objectives for the coming quarter. We are asking that all sections be completed. We recognize that there may be some areas for certain groups of students which have not been covered in depth in class or where there has been inadequate opportunity to observe, or for the student to perform, but we believe the ratings are still important for use as indices to measure student growth the following quarter(s).

Instructions for use of the PAC

1. The Rating Scale: This is a 5-point scale with 1 being "rarely" and 5 being "consistently." Circle the appropriate number to indicate the student's performance on each item. If you feel unable to adequately judge the student's performance (for example: not enough opportunity to observe or determine the behavior, or the student has not had the opportunity to express the behavior), please comment in the space provided after each major heading, indicating the item number.
2. Additional Notations: Mark (X) next to item numbers where you feel inadequate progress has been made.  
Check (✓AE) next to item numbers where there has been adequate progress but more concentrated attention is needed in the next quarter.
3. The space after each major heading is provided for comments or further elaboration about the student's performance on the item(s) above it. It can also be used for comment about the item itself -- your immediate response to the clarity, language, meaning or importance of the item.
4. The evaluation should be done jointly by the student and field instructor and, if possible, the faculty advisor. Worksheets have been provided for use by the student and field instructor prior to the evaluation conference. The ratings on the composite forms will represent, as much as possible, a consensus. If there is strong disagreement on any item on the PAC, comment in the space at the end of the major heading, indicating the item number.

\*From Institutional Report No. 4, Wayne State University. The Refinement and Modification of an Instrument for Assessing the Achievement of Interpersonal Skills of Social Work Students. CAEL, 1975.

Scale: 1 2 3 4 5  
rarely consistently

### III. CHECKLIST (Cont.):

#### BASIC EDUCATIONAL AND PERFORMANCE SKILLS

##### A. Learning Patterns:

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 1. Shares work with others .....                              | 1 | 2 | 3 | 4 | 5 |
| 2. Seeks feedback and critique regarding own work .....       | 1 | 2 | 3 | 4 | 5 |
| 3. Shows ability to evaluate own work .....                   | 1 | 2 | 3 | 4 | 5 |
| 4. Shows ability to apply basic concepts and principles ..... | 1 | 2 | 3 | 4 | 5 |
| 5. Contributes to the learning of others .....                | 1 | 2 | 3 | 4 | 5 |

##### B. Work Habits:

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 1. Is on time for appointments .....            | 1 | 2 | 3 | 4 | 5 |
| 2. Shows responsibility for work coverage ..... | 1 | 2 | 3 | 4 | 5 |
| 3. Completes assignments on time .....          | 1 | 2 | 3 | 4 | 5 |

##### C. Values:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 1. Shows awareness of social work values (for example: confidentiality, individuality, etc.) ..... | 1 | 2 | 3 | 4 | 5 |
| 2. Shows awareness of client and societal values .....   | 1 | 2 | 3 | 4 | 5 |
| 3. Shows awareness of service system values .....  | 1 | 2 | 3 | 4 | 5 |
| 4. Shows awareness of own value system .....   | 1 | 2 | 3 | 4 | 5 |
| 5. Shows ability to identify points of value conflict ..   | 1 | 2 | 3 | 4 | 5 |

COMMENTS:

#### COMMUNICATION AND OBSERVATION SKILLS

##### D. Interpersonal Communications and Relationship Skills:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 1. Expresses self clearly in verbal communication .....                    | 1 | 2 | 3 | 4 | 4 |
| 2. Demonstrates ability for establishing warm, helping relationships ..... | 1 | 2 | 3 | 4 | 5 |
| 3. Demonstrates acceptance of self and others .....                        | 1 | 2 | 3 | 4 | 5 |
| 4. Expresses differing points of view without deprecating others .....     | 1 | 2 | 3 | 4 | 5 |
| 5. Expresses self clearly in written communication .....                   | 1 | 2 | 3 | 4 | 5 |
| 6. Shows ability to organize written material .....                        | 1 | 2 | 3 | 4 | 5 |
| 7. Records factual material clearly .....                                  | 1 | 2 | 3 | 4 | 5 |



## COMMUNICATION AND OBSERVATION SKILLS (Cont.)

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 8. Shows ability to record attitudinal and feeling content .....   | 1 | 2 | 3 | 4 | 5 |
| 9. Shows ability to describe own actions .....   | 1 | 2 | 3 | 4 | 5 |
| 10. Shows consistency in the verbal and non-verbal messages given .....  | 1 | 2 | 3 | 4 | 5 |
| 11. Demonstrates ability to listen .....   | 1 | 2 | 3 | 4 | 5 |
| 12. Demonstrates ability to hear underlying message .....  | 1 | 2 | 3 | 4 | 5 |
| 13. Picks up signs of feeling, intellectual grasp, and behavior expressed by others in verbal and nonverbal ways ..... | 1 | 2 | 3 | 4 | 5 |
| 14. Responds to signs in verbal ways (spoken/written) ...  | 1 | 2 | 3 | 4 | 5 |
| 15. Responds to signs in nonverbal ways to provide acknowledgment, correction, or clarification .....                  | 1 | 2 | 3 | 4 | 5 |

### E. Observation:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 1. Demonstrates ability to report behavior in specific, non-labeling terms ..... | 1 | 2 | 3 | 4 | 5 |
| 2. Demonstrates ability to individualize persons being observed .....            | 1 | 2 | 3 | 4 | 5 |
| 3. Demonstrates ability to describe environmental context .....                  | 1 | 2 | 3 | 4 | 5 |

### COMMENTS:

## PROBLEM-SOLVING SKILLS

### F. Problem Definition:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 1. Shows ability to state nature of concerns that are being brought to his/her attention ..... | 1 | 2 | 3 | 4 | 5 |
| 2. Shows ability to perceive possible related and underlying concerns .....                    | 1 | 2 | 3 | 4 | 5 |

### G. Fact Finding:

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 1. Shows purposefulness in gathering facts .....                          | 1 | 2 | 3 | 4 | 5 |
| 2. Shows selectivity in gathering facts .....                             | 1 | 2 | 3 | 4 | 5 |
| 3. Demonstrates ability to organize facts .....                           | 1 | 2 | 3 | 4 | 5 |
| 4. Shows ability to engage in speculation as to meaning of the data ..... | 1 | 2 | 3 | 4 | 5 |

## PROBLEM-SOLVING SKILLS (Cont.)

### H. Assessment:

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 1. Shows ability to identify the major systems involved with the problem(s) being addressed .....                                   | 1 | 2 | 3 | 4 | 5 |
| 2. Shows ability to identify strengths and resources within the transacting systems and in their transaction with one another ..... | 1 | 2 | 3 | 4 | 5 |
| 3. Shows ability to identify breakdowns or dysfunctions and contribution factors .....  | 1 | 2 | 3 | 4 | 5 |
| 4. Shows ability to see the inter-relatedness of these factors .....  | 1 | 2 | 3 | 4 | 5 |
| 5. Shows ability to assess the degree of openness-closeness of systems as related to their potential for change .....               | 1 | 2 | 3 | 4 | 5 |

COMMENTS:

## PROBLEM-SOLVING SKILLS (Cont.)

### I. Designing a Plan of Action:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 1. Takes initiative to collaborate with others involved with the problem in formulating objectives and selecting a plan of action .....                                  | 1 | 2 | 3 | 4 | 5 |
| 2. Exhibits skill in helping others to identify and explore alternative courses of action and the potential consequences of each .....                                   | 1 | 2 | 3 | 4 | 5 |
| 3. Makes conscious use of verbal or written contract-setting (working agreement) as a requisite for plan adoption .....  | 1 | 2 | 3 | 4 | 5 |
| 4. Adopts a plan of action that takes into consideration available resources (people, organizations, energy, time, cost, etc.) .....                                     | 1 | 2 | 3 | 4 | 5 |
| 5. Takes into consideration own knowledge, skill, and time .....   | 1 | 2 | 3 | 4 | 5 |
| 6. Takes into consideration values of the profession and of the systems involved .....   | 1 | 2 | 3 | 4 | 5 |
| 7. Writes and discusses plan of action clearly, specifying objectives to be achieved, interventions to be utilized, and specific tasks and roles of those involved ..... | 1 | 2 | 3 | 4 | 5 |
| 8. Exhibits skill in helping others translate goals into tasks/steps .....   | 1 | 2 | 3 | 4 | 5 |

## PROBLEM-SOLVING SKILLS (Cont.)

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 9. Determines which of several systems involved in the situation to select as the major unit(s) of attention .....      | 1 | 2 | 3 | 4 | 5 |
| 10. Plans differentially for each individual client/problem situation, avoiding use of a singular or fad approach ..... | 1 | 2 | 3 | 4 | 5 |
| 11. Builds into the plan of action the means for later evaluation of outcomes .....                                     | 1 | 2 | 3 | 4 | 5 |
| 12. Identifies theories and practice models that support and contribute to the plan of action .....                     | 1 | 2 | 3 | 4 | 5 |
| 13. Recognized that no plan is rigid or sacred, but that a plan is needed .....   | 1 | 2 | 3 | 4 | 5 |

COMMENTS:

## PROBLEM-SOLVING SKILLS (Cont.)

### J. Intervention:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 1. Conceptualizes the intervention process as an orderly, systematic means of effecting change, utilizing a general systems perspective and knowledge of the functioning of individuals, families, groups, organizations and communities ..... | 1 | 2 | 3 | 4 | 5 |
| 2. Has realistic expectations of self and others in relation to task performance and time allotment .....  | 1 | 2 | 3 | 4 | 5 |
| 3. Demonstrates ability to collaborate and share social work knowledge and skill with other members of a professional team or work group in implementing plan(s) of action .....   | 1 | 2 | 3 | 4 | 5 |
| 4. Demonstrates capacity for creative and innovative thinking (in relation to program development, or to efficient and effective service delivery, or to coordination of staff, team, inter-agency efforts) ..                                 | 1 | 2 | 3 | 4 | 5 |
| 5. Demonstrates comfort and skill in the appropriate use of verbal and nonverbal sustaining procedures (sympathetic listening, acceptance, desire to help, realistic reassurance) .....  | 1 | 2 | 3 | 4 | 5 |
| 6. Shows awareness of the usefulness and limitations of the technique of ventilation, exploration, reflection, and problem-solving .....   | 1 | 2 | 3 | 4 | 5 |
| 7. Uses direct influence and regulatory procedures (reinforcement, suggestions, advice-giving, limit-setting, rule-making, rule-enforcing) with caution, and interpersonal sensitivity, and only when appropriate .....                        | 1 | 2 | 3 | 4 | 5 |

## PROBLEM-SOLVING SKILLS (Cont.)

8. Distinguishes between crisis situations and other problem situations presented, and manages interventions accordingly (crisis intervention emphasizes an active, directive, highly focused approach) ..... 1 2 3 4 5
9. Uses knowledge and skill in connecting client systems with needed resources ("brokerage" function) and differentially determines the type and amount of worker help needed by each client system to get to resources ..... 1 2 3 4 5
10. Shows skill in role of mediator when persons in actual or potential conflict need help to work together .... 1 2 3 4 5
11. Accepts and uses appropriately and with sensitivity to all concerned, the role of advocate to protect the rights of clients unable to so act in their own behalf ..... 1 2 3 4 5
12. Demonstrates knowledge and skill in use of educative techniques when clients or others need information to assist them in problem-solving, and transmits information in ways that are nonthreatening and usable ..... 1 2 3 4 5

COMMENTS:

## PROBLEM-SOLVING SKILLS (Cont.)

### K. Termination/Transfer:

1. Understands the psychological significance and impact of separation experience ..... 1 2 3 4 5
2. Encourages clients and others to express their feelings (and expresses own) about impending terminations or transfers ..... 1 2 3 4 5
3. Plans ahead appropriately and differentially for the ending phase with clients and others ..... 1 2 3 4 5
4. Maintains a healthy balance between concern for clients and need to "let go" ..... 1 2 3 4 5
5. Takes responsibility for terminations/transfers through verbal and/or written communication ..... 1 2 3 4 5

### L. Evaluation:

1. Helps clients and others to evaluate movement toward agreed-upon goals ..... 1 2 3 4 5
2. Assists in realistic evaluation by maintaining records of what has taken place ..... 1 2 3 4 5

PROBLEM-SOLVING SKILLS (Cont.)

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 3. Participates in evaluation of own work .....                                       | 1 | 2 | 3 | 4 | 5 |
| 4. Shows ability to use evaluations as a basis for<br>changing course of action ..... | 1 | 2 | 3 | 4 | 5 |

COMMENTS:

IV. SUMMARY STATEMENT, including EDUCATIONAL OBJECTIVES FOR NEXT QUARTER  
(AND/OR REST OF THE YEAR)

Objectives should be related to the evaluation of student's performance this past quarter. The objectives should be stated in behaviorally specific terms, such as: "Develop increased ability to pick up nonverbal clues." or "Develop greater selectivity in fact gathering." There should also be specific suggestions for ways to assist the student in moving toward these objectives, and the types of assignments to be provided, such as "Supportive work with individuals." or "Assignments that involve helping families improve their interpersonal communication skills," etc.

(Use additional sheets if needed.)



## Appendix 7

### SUMMARY DESCRIPTION:

#### CLINICAL PERFORMANCE IN NURSING EXAMINATION

The University of the State of New York  
REGENTS EXTERNAL DEGREE  
99 Washington Avenue  
Albany, New York 12210

Office of Programs Development  
519: 474-3703

General Information: The following is a summary of the Clinical Performance Nursing Examination required for the completion of the Regents External Associate Degree in Nursing Program.

The Clinical Performance in Nursing Examination (CPNE) is a 2 1/2-day examination administered totally in a general hospital (only in Albany at this time). It is designed to test a candidate's ability to perform as a registered nurse at the associate degree level, and to test those areas that cannot be evaluated on written exams. Candidates are eligible to take the CPNE only after they have successfully completed or have waived the seven written Regents External Degree Nursing examinations. The CPNE is administered throughout the year by appointment only and will be given primarily on weekends (Friday to Sunday). The examination fee is \$250. Candidates are expected to make their own arrangement for lodging; a map of the Albany area, including motels, is sent with the letter confirming the appointment.

The examination includes a maximum of two simulated nursing laboratory situations, three adult Patient Care Situations (PCSs), and two child PCSs. To pass the performance examination, each candidate must successfully complete one of the labs, two of the adult PCSs, and one of the child PCSs. The faculty has carefully determined those nursing actions that must be correctly performed by the candidates, including specific actions called Critical Elements. To be successful in a PCS, a candidate must perform with 100% accuracy according to the Critical Elements which are outlined in the Nursing Process Assessment Guide section of the Clinical Performance Study Guide.

Each area of nursing care is specifically defined, and all of the Critical Elements for it are listed. Patients are selected because they require these areas of care, and candidates are evaluated on the basis of their performance of the Critical Elements. Some areas of care are Personal Hygiene, Vital Signs, Mobility, Fluids, Suctioning, Irrigations, Surgical Dressings, Medications, Infant Feeding.

Example: Following is an example of an area of nursing care and its critical elements.



### Areas of Care

**MEDICATIONS:** The administration of drugs by any route: by mouth, intramuscular, intravenous, subcutaneous, or other

### Critical Elements

1. Secures the correct medication
2. Measures the correct dosage
3. Administers the correct drug to the correct patient
4. Uses the correct route and/or site for administering the medication
5. Administers the medication within 1/2 hour of the scheduled time
6. If IV medication:
  - a. clears air from tubing before initiating flow
  - b. verifies patency of tube before initiating flow
  - c. administers or regulates flow to deliver correct amount in correct period of time
7. Records medications

An evaluator will closely observe each candidate during the administration of all aspects of nursing care. Evaluators are associate degree nurse educators who have received a special orientation for this role. Since this is a performance exam, evaluators will judge the candidate's actions according to the Nursing Process Assessment Guide; candidates will not be asked to explain their actions except as specified on the Nursing Care Plan. Theory already has been tested on written exams.

### Laboratory Simulation

In the laboratory portion of the exam, the candidate simulates the preparation and administration of IV, IM, and oral medications and the application of a sterile dressing. An evaluator observes all aspects of the simulations, using the same critical elements that are used in the patient care situations.

### Patient Care Portion of the Examination

The candidate will be required to successfully plan, implement, and evaluate complete nursing care for a minimum of three patients (two adults and one child) and a maximum of five patients (three adults and two children). Planning consists of writing a Nursing Care Plan (NCP), which requires listing the patient's needs for nursing care and specifying priorities for nursing care. Only after the NCP is approved by the evaluator may the candidate begin to implement the nursing care required by the particular patient. The candidate's evaluation of the care given and revision of the NCP are part of each PCS.

When a candidate fails any critical element or in any way violates principles of asepsis or jeopardizes the physical and/or emotional well-being of the patient, that PCS is terminated and failed. This degree of stringency is required for the protection of patients and the assurance of quality performance; candidates are given three chances to pass two adult PCSs and

two chances to pass one child PCSs. During the 2 1/2-day exam, each candidate is evaluated by at least three different evaluators to minimize potential bias in the evaluation process.

The CPNE may be considered a diagnostic or self-learning experience, and candidates who fail the exam may retake it at a later time. The requirements for reapplication are given in the study guide.

The candidate will know the outcome of the CPNE at the conclusion of the examination.

#### Schedule

Day 1 - 4:30

Orientation to exam and to hospital units; Lab 1

Day 2 - 7:30 a.m. - 1 p.m.  
2:30 - 3:30 p.m.

PCS 1 and 2  
Lab 2 (if needed)

Day 3 - 7:30 a.m. - 4:30 p.m.

PSC 3-5

#### Study Guide

The candidate Study Guide specifies all areas of nursing care that may be selected, all critical elements, and all rules and regulations pertaining to the Clinical Performance Examination. It also includes suggestions on methods of preparation for the exam. The Study Guide is available on request from the central office.

## PHYSICAL ASSESSMENT OF ETHNIC PEOPLE OF COLOR

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The health care delivery system for ethnic people of color is sorely inadequate. We have just begun to identify and supply the need. It is now recognized that there is a unique difference in their health care needs and practices. I want to share certain information about health assessment of ethnic people of color, especially Blacks, and to some extent, Chicanos. Much of my material comes from personal teaching experiences in several clinical facilities in and near the Los Angeles area; the most recent was at the Martin Luther King, Jr., General Hospital near Watts.

I realize it is not possible to identify completely all assessments for all ethnic people of color; but I do want to accentuate some of the more common assessments.

Physical History: Beginning with the patient's history, one must be aware of and sensitive to the reality of Black dialect and its meaning to obtain a correct clinical picture through communication. This difference should not imply a deficit. Blacks may say, "I've got the miseries". This may be indicative of heart problems. Be aware of Black folk practices in obtaining data. Often I have had to interpret dialect and folk medicine for nonethnic medical personnel. A young Anglo physician once asked me about "Black Draught," because eight of every ten patients he saw at the walk-in hospital clinic mentioned this physic. When told of its tonic nature and desirous qualities, the young doctor was amazed that it was not on the shelves of the drug store in his neighborhood.

There are instances in which Black or Chicano dialect plays a vital role in the clinical setting. I find that the presence of many whites (Anglos) influences speech patterns. Many Blacks use soul talk in the presence of whites--it is the "in thing" to do. One morning I was asked to interpret soul talk between two Black males at the hospital Emergency Room. The two "brothers" were doing a "number" on the Anglo, apparently under the influence of drugs. In dialect, "We wuz sittin' in my main man's pad shootin' up H when these dudes ripped off our threads." Reinterpreted, it meant while visiting

very close friends and enjoying a little heroin, unknown males broke in and stole our clothes. In Black dialect, the term "catch" might be spoken as "cotch". For example, "I cotched pneumonia from the bad cold I had". As health providers, we must be careful not to put a negative value on dialect.

After taking the patient's history comes the physical examination. In the physical assessment of ethnic persons of color, there are similarities in the general approach, but there are also some definite differences in Blacks, particularly regarding certain disease entities that are special problems to them.

General Appearance: When observing skin pigmentation in Blacks, do examine mucous membranes. Purplish to dark hues are normal, depending on the degree of melanin present. Keloid formation is a factor following wound healing or ear piercing. Other skin disorders prevalent in Blacks include keloids, which are one of the more common skin problems, with keloid acne as a particular form of keloids, most often appearing at the scalp line. Dermatitis papulosa nigra is a skin disease that is characterized by pigmented papules on cheeks; in time these papules may increase in size and number. Another problem common to Blacks is Pseudo folliculitis barbae, inflammation of the hair follicles, (ingrown hairs).

Skin color and hair texture are inherited independent of one another. Variations in skin color are due to racial mixing. The hair texture varies from curly to straight. Research indicates that the cross-sectional shape of Blacks' hair shafts is elliptical (like a kidney), contrasted to the round shape in Caucasian hair. Detection of many significant changes in the health status of Black patients depends on observation of changes in skin color. These changes may not be easily recognized in skin that varies from brown to black. Vasoconstriction and anemia are reflected by a peculiar "ashy" color. Inflammatory reddening of the skin, as with exanthematous diseases in very dark Chicanos or Blacks may be difficult but not impossible to diagnose. Cyanosis can be detected in the buccal (cheek) cavity (vascular bed) and eye grounds, not necessarily in earlobes or nail beds. One must observe the sclera, mucous membranes, and tongue when making assessments.

Hypopigmentation: Vitiligo is an acquired cutaneous affliction characterized by milk-white patches surrounded by areas of normal pigmentation. Albinism is the abnormal, nonpathological absence of pigment in skin, hair,

and eyes. It may be partial or total and is frequently accompanied by astigmatism, photophobia, and nystagmus as the choroid is not sufficiently protected from light because of the lack of pigment called albino. Other conditions may cause hyperpigmentation, including inflammatory diseases of the skin such as tinea versicolor (ringworm), burns, and dermatitis. These usually appear as shiny areas.

Psoriasis is more yellow in color, and the crusting is thicker, and less shiny, but the scabs are easily removed. It responds well to medication with infrequent relapse.

Ear-Nose-Throat: These disease entities are found not only in Blacks but also in nonwhites in general and in poverty groups in this country. Otosclerosis, common in Blacks, Chicanos, and American Indians, can cause a definite loss of hearing. Some of the otolaryngological disorders are believed to be more related to socioeconomic factors such as poverty, poor nutrition, and inadequate health care than to race.

Endocrine: I am unaware of any statistical studies in this area. There are many theories regarding the incidence of diabetes in Blacks and Mexican Americans. Diet plays a significant role with the genetic factor.

Ophthalmology: There are racial differences in certain diseases and tumors of the eye. Melanomas of the choroid are found less frequently in Blacks than in whites, but melanocytomas of the optic nerve are found almost exclusively in Blacks. Mixed-mechanism glaucoma is frequently found in Blacks and is very difficult to treat.

Cardiovascular: Assessment of the heart by electrocardiogram examination shows that Blacks often have a different heart pattern than Anglos. If the normal pattern of inverted T-waves in precordial leads of Blacks were found in whites, it would be indicative of cardiac pathology.

Studies have shown that there is a higher prevalence of hypertension among Blacks than among whites. The relationship of sex and age to hypertension follows different patterns in whites and nonwhites. A direct relationship has been found between the amount of skin pigmentation and frequency of hypertension in Blacks, but this has not yet been fully documented. It is still controversial, as data regarding African Blacks and dark-skinned Indians do not support this theory.

A common disease of Black people is sickle-cell anemia (4), a genetic disease in which hemolysis and thrombosis of red blood cells occur because of a



"sickling" process. It affects at least 10 percent of the Black population of the U.S. In certain forms it is incurable; in other forms there is survival, but spasmodic and painful crises occur. Far too little is known about thiscrippler. However, we do know that sickle cell anemia results in the occurrence of abnormal hemoglobin in the red blood cells, interfering with the body's oxygen supply. These cells clump in the veins, and pain and physiological crises result. The disease occurs essentially in two general forms. The trait form represents a single dose, or inheritance, from one parent. The true anemia form represents a double inheritance from both parents. Therefore, when two carriers marry, their children have a 25 percent of chance of inheriting sickle cell anemia. Few children with the disease survive to adulthood.

Hematological: Glucose 6 phosphate dehydrogenase (G-6-PD) deficiency is a hereditary abnormality in which the activity of the enzyme G-6-PD is markedly diminished. Erythrocytes are severely affected, and G-6-PH deficiency may result in hemolytic anemia. Drugs such as chloramphenicol, Furacin, and sulfa have an adverse effect. Screening for this deficiency is done with a fluorescent spot test.

It is important for nurses to be aware of red blood cell antigen differences between races (5). There are different normal values for various clinical and hematological tests, including RH groups, and ABU groups. However, specific statistics are not yet available.

Pulmonary: Tuberculosis, influenza, and pneumonia are more common in Blacks and Indians, probably owing to environmental conditions such as overcrowded housing, poor sanitation systems, and poor nutritional status. Tuberculosis is declining on the national scale (1); however, nonwhites continue to have higher new-case-rates compared to whites during any given year. The rates are higher in urban areas and on Indian reservations.

Pediatrics: The infant mortality rate for nonwhites is approximately double the rate for whites. Almost 60 percent of mothers living in ghettos have inadequate prenatal care (3). Approximately 50 percent of poor children are incompletely immunized against smallpox and measles. Dental statistics are inadequate for reporting.

Gynecology/Obstetrics: Fibroid tumors are common in heavily pigmented women over the age of 40. Statistics suggest almost half of Black women have them. They can be asymptomatic or require a hysterectomy.



Cancer: The cancer rate is increasing in nonwhites. Rates for common cancer types such as lung, breast, colon, pancreas, prostate, and bladder, are increasing. Environmental factors such as occupational exposure, housing, and industrial health hazards must be considered. Increased lung cancer has, of course, been linked to increased cigarette smoking. Increased alcohol consumption may be related to a rise in esophageal cancer in Blacks.

Medical Crisis: In terms of health assessment, the disadvantage of being an ethnic person of color, added to the acute doctor shortage in nonwhite communities, has left its effects. The shortage has been greatest in nonwhite communities (2). News reports from the University of Southern California County Medical Center have indicated increased abuse of an already overworked system.

I hope this discussion of physical assessment of ethnic people of color will help bring about an awareness that will help to better meet their health care needs.

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### Additional Reading

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INTRODUCTION AND INTEGRATION OF HEALTH ASSESSMENT  
IN THE ASSOCIATE DEGREE PHASE AT  
BRIGHAM YOUNG UNIVERSITY COLLEGE OF NURSING

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Nursing, as one of the health professions greatly affected by the changing national trends, finds itself being more aggressive in the delivery of health care. Nursing programs are using various approaches to meet the needs and expectations of society. Some programs are providing opportunities to develop the currently emphasized skills and knowledge through continuing education. Others are adding this content to baccalaureate and master's degree programs.

Brigham Young University College of Nursing was one of the first to develop a totally new curriculum that integrated the currently emphasized skills, such as health assessment, throughout the entire nursing curriculum. ~~We have lived through the experimental part of the program. The faculty~~ believes that the curriculum design is sound and that the objectives not only emphasize the present role of professional nursing but also prepare graduates for new and, most likely, future roles.

Prior to 1972, nursing educational offerings at Brigham Young University consisted of a baccalaureate degree offered by the College of Nursing and an associate degree offered by the College of Industrial and Technical Education. The two programs were autonomous. After much study, it was decided that provisions for career mobility, which permit a continuum of preparation from associate degree through baccalaureate and master's degree levels would be provided at Brigham Young University. By much pain, anguish, and turmoil, we brought two completely separate faculty together in a common effort and developed the present curriculum. Those with any experience like this know why we feel that we have accomplished the impossible.

The theoretical framework of this curriculum consists of two phases: Phase I--the associate degree phase, and Phase II--the baccalaureate degree phase.

Both phases have the same philosophical base: emphasizing recognition of the worth of the person, with concern for individualization of goals,

needs, interests, and experiences. The overall objective of the associate degree phase of the program is to prepare a beginning staff-level practitioner who can give total nursing care under supervision in a variety of structured health care settings. In addition, the baccalaureate degree phase of the program prepares the nurse to function as a primary care practitioner in a community setting and to assume beginning leadership with some additional experience and orientation. The graduate has the prerequisite background for entrance into the graduate nursing program. Graduates from both phases are eligible to take the state board licensing examination.

Phase I of the curriculum provides a sound base for the continuum of nursing courses in Phase II. In contrast to the traditional baccalaureate curriculum, the nursing courses of Phase II are genuinely upper division and on a professional, problem-solving level. That statement is justified on the basis of the rationale that some of the content in the junior and senior years of the traditional baccalaureate curriculum had to be on a basic, lower division level, as students were rotated for the first time through pediatric, obstetric, psychiatric, and leadership experiences. All this basic content is provided in Phase I of the new curriculum nursing courses.

The objectives and content of the two phases are centered around the development of four basic tools that to different degrees, are essential in preparing associate and baccalaureate graduates: investigation, clinical expertise, self-actualization, and leadership.

There is an increase in depth and breadth as the student works with these tools through the program and becomes more skillful in their application. Content and experience are developed so that these tools are included in each course with a varied amount of emphasis. At the end of each course, the student is expected to demonstrate some growth in relation to each.

We decided that if the baccalaureate nurse is to supplement, complement, and practice differently than an associate degree nurse, she needs both the general knowledge and skills essential to basic nursing practice and a higher level of knowledge and skills for professional primary care. She should have the so-called expanded skills built onto the traditional function of care and comfort. We are defining primary care as (1) a person's first contact with the health care system that leads to a decision on what must be done to resolve a problem, (2) responsibility for the continuum of care, (3) maintenance of health, (4) evaluation and management of problems, and

(5) appropriate referrals.

To educate students for the future, different types of experiences and settings for them are used. These are balanced with clinical experiences to avoid a narrow view of the health care system and to prepare a primary care practitioner of nursing who can practice in a variety of ways and in a variety of settings.

When we decided that our baccalaureate graduate would be a primary care practitioner and we defined the level at which she would practice, we realized our expectations were high and that the time was short, especially when we considered continuing to maintain the characteristics of baccalaureate education as stated by the Council of Baccalaureate and Higher Degree Programs. It was concluded that, to accomplish all of this in Phase II, the students must come from Phase I with the ability to assess the normal.

In 1971, when I went to Brigham Young University, I had already completed my preparation as a family nurse practitioner. As I began teaching, I had a firm belief that there were certain assessment skills that all registered nurses should have as part of their preparation in addition to their traditional skills. Therefore, I started teaching assessment skills while we were ~~still locked into the old curriculum and were developing the present curriculum.~~

There are many reasons why I believe these skills should be part of basic preparation. After I had taught one semester of introductory medical/surgical nursing, it was obvious that we had been expecting students to do patient assessment but had not given them the skills to do so. The students were expected, on the morning of clinical experience, to hand in a written pre-assessment of the assigned patients.

The papers my students submitted as evidence of preassessment were anything but patient assessment. Instead, they were assessment of the Kardex or assessments of the physician's recordings, which usually covered only the physical problem. Even the more in-depth assessment papers of later post-patient care were merely a copying of other health professionals' assessments, with the addition of textbook research into the problems. Total patient assessment was neglected.

But how could we expect patient assessment at a different level if we did not teach skills that would enable students to perform patient assessment? If we expected students to render safe, effective patient care in their first nursing course, we knew we must also teach them assessment then. As I show



how we developed and integrated physical assessment, remember that all basic assessment skills are included in Nursing 106. The faculty were expert in teaching other assessment components but found teaching physical assessment skills to be the most threatening and challenging. I have found the feelings of our faculty similar to nursing educators in most areas of the country. I have taught physical assessment skills to students at all levels, and I find that one level of students is as capable as the next. The interpretation of findings and the ability to make judgments and decisions, however, are a different situation.

We use many techniques for teaching physical assessment skills, including self-instruction, demonstration, supervised practice, and return demonstration. The student must master through return demonstration all basic care skills, such as vital signs, bed bath, and catheterization. The student then proceeds with the assessment module. On an individual basis, the student has access to multiple media on physical assessment. The content of this media relates to organization of the physical examination, physical assessment technique, and use of equipment to perform physical assessment.

An instructor then performs a physical examination on a selected patient before the total group of students. The class is then divided into small groups, in which they practice specific skills such as examining ears, chest, abdomen, and neurological function. The next day, the groups go to nursing homes where selected skills are practiced. For example, these students have already listened to normal breath and heart sounds, but at the nursing home they have an opportunity to contrast normal to abnormal. There is no attempt to have students diagnose, only to compare. We have found nursing homes contain much pathology; also, these patients enjoy the attention. The students then refer back to the media, if indicated. The next step is to practice on classmates under supervision. There are many advantages to practicing on students: (1) the students are better able to identify with the patient role, and (2) it provides an added exposure to review and to the organization of performing a physical examination. The student then must pass a written examination on physical assessment. If the student passes this examination satisfactorily, she can demonstrate to an instructor her proficiency in performing both history taking and physical examination. The student is then cleared to perform assessment in the hospital setting. We found that



students must have achieved basic competency in these skills before working with hospitalized patients. The students feel more confident, procedure is smoother, and there is less anxiety. We have found that students must have mastered the motor skills before they can proceed to higher level objectives that involve assimilation of data gathered from assessment or interpretation of data.

During this first nursing course, students are assigned an average of two adult patients per day. The student can perform complete or partial assessment related to specific problems on these patients, in addition to total patient care. The assessment is written up and submitted to the clinical instructor.

Throughout following courses, assessment is demonstrated on patients of all age groups, and specific skills and systems are emphasized until the last semester in Phase I, when again the student is expected to demonstrate total assessment on all patients. Other assessment skills that have been introduced and integrated include interviewing techniques, history taking, growth and development, nutrition, and mental health appraisal. During Phase I, the student is expected to observe signs and symptoms relating to patient disease process and evaluate these in relation to her accumulated knowledge. Using the nursing process, the student chooses appropriate action and gives needed patient care.

At the beginning of Phase II, the student is expected to demonstrate proficiency at assessment before she can proceed to more complex primary care skills.

In physical assessment we include assessment of all systems, including the neurological exam. However, we do not include the examination of genitalia during Phase I. In Phase II we do expect students to perform genital, pelvic, rectal, and prostate examinations. We expect proficient use of routine diagnostic equipment with the exception of the ophthalmoscope. We have excellent media instruction on the use of the ophthalmoscope, and we dilate the eyes of students for practice sessions. However, we do not expect proficiency in the use of this instrument, but we do insist that they keep trying. By the time the student has had repeated exposure over a two-year period we feel that dexterity will increase, and the Phase II student will become proficient. In doing cardiac auscultation, we expect the student to distinguish normal from abnormal. No attempt is made to teach interpretation of abnormal sounds until

later courses.

We believe a student can gain adequate motor skills in a short time. Students can carry out and record reliable physical assessment. However, physical assessment is not the most important part of the assessment process. Obtaining a history by the use of interviewing techniques and the ability to analyze data are more important skills and must be developed throughout the four years.

But what about the time factor? Our clinical experience has shown that we did spend some additional time for added skills but not a significant amount. We were already teaching some components of physical assessment. It was mainly a matter of adding to these skills. For example, when teaching a student to take an apical pulse, we were stressing listening at the apex for rate and rhythm. It did not take much more time to teach the student to listen to the appropriate areas of the heart or to listen selectively to the first and second heart sounds, to identify the relationship of heart sounds to specific anatomical structures, and to report and record these findings. After teaching students to count respirations, it took little additional effort to teach them to identify normal versus abnormal breath sounds and how to listen selectively. It takes little additional time to add the skills of auscultation, percussion, and palpation to the skill of inspection so long used in nursing.

Now, instead of students spending their time assessing the Kardex and patient chart, they have reason to be at the bedside assessing the patient, thus providing the students more opportunity to interact with patients, as well as to gain additional information to render safe, adequate patient care.

In the above description, I did not want to give the impression that the only reason for inclusion of assessment into Phase I (Associate Degree Phase) was just to provide a basis for Phase II. That it does provide such a basis is true, but more importantly is that we consider assessment basic to nursing. How can any nurse develop a nursing care plan, establish a base line for patient care, whether her goal be maintenance, recovery or rehabilitation, if she cannot or does not perform actual patient assessment? For example, a geriatric patient suffering from a cerebral vascular accident is admitted to the medical floor. The physician has not yet had adequate time to do an in-depth neurological examination; however, he orders a diet that the nurse

Because the physician ordered it the nurse assumes the

doctor knows best and the patient aspirates. How much better it would be if the nurse had performed a neurological assessment--at least on the cranial nerves (which takes very little time)--and reports back to the doctor and other nursing staff that this patient has dysfunction of the vagus nerve and loss of swallowing reflex? How can a plan of nursing care or evaluation of progress be developed if the nurse does not first establish the level the patient is at when admitted?

Many times patients are admitted for one problem but during the course of hospitalization develop other problems. In fact, patients may die because of the development of problems other than the one for which they were admitted. Pneumonia, pulmonary embolus, pneumothorax, and thrombophlebitis are examples of problems often developed after hospitalization. It seems logical, then, that people responsible for the constant and direct patient care should be able to perform physical assessment. The nurse is with the patient to monitor change more hours of the day than anyone else.

Today the associate degree nurse must have a broader base of knowledge and skills than were required in the past. She must not only have the traditional skills, but she must also acquire knowledge to help her make better judgements and decisions about the patients for whom she cares.

HEALTH ASSESSMENT CONTENT IN THE BACCALAUREATE PROGRAM  
AT THE UNIVERSITY OF UTAH

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The students entering the University of Utah wishing to major in nursing have at least one general-education prenursing year. After they identify their major, complete all basic science and general education prerequisites, and take the nursing student selection tests, those formally selected enter the nursing courses in the fall.

About 100 students are admitted to the program each year. Total enrollment in the undergraduate program is approximately 300 to 325 students. The faculty is organized into three teaching teams, one for each level--that is, sophomore, junior, and senior. Each team has members representing the five clinical content areas in the program. The student/faculty ratio is approximately 1:12 during the sophomore and junior years and about 1:16 during the senior year.

Although consensus among faculty members regarding a definition, or description, of the baccalaureate graduate is still in a state of evolution, the general beliefs at this time are that all baccalaureate graduates should have a basic generalist preparation, with additional opportunities to develop some competencies in a particular clinical area of their choice at somewhat greater depth. The intent is that the graduates will have the capability for relatively independent functioning related to assessment of health status of clients for the planning, implementation, and evaluation of therapeutic and/or health promotion programs.

The faculty at the University of Utah College of Nursing began delineation of health assessment and primary care content for both graduate and undergraduate programs about two and one-half years ago. During these years of activity, many decisions regarding nursing role and function in providing primary care to clients have been made. However, in terms of delineation of specific content, levels of content, or criteria for inclusion or exclusion of such content, very little has been formalized. Perhaps the faculty should have been more tenacious in their attempts to identify specific content to be offered. However, faculty discussions usually centered globally

around depth of knowledge brought to bear on given clinical problems as being representative of the major differences rather than identification of specific health assessment content.

For the last 18 months, the undergraduate program has received some support from a funded training project. The purpose focused upon the implementation of nurse practitioner roles and functions at the baccalaureate level. Because the major thrust of the project thus far has been preparation of faculty, considerable interest and concern has been generated among the faculty about the primary care curriculum content and the accompanying experiential learning changes.

Discussions about the identification and placement of content related to health assessment skills necessary for incorporation of primary care content into the curriculum have focused on attempts to resolve two major questions: (1) how can a curriculum be restructured so that a "new" emphasis, such as primary care, does not exact cost from some clinical content areas deemed of value? and (2) what level of expertise of core skills can be expected from undergraduate students in each clinical area of nursing? The faculty has not yet found the answers to these questions, although some progress has been made. Perhaps the most significant progress was in the faculty's recognition that curriculum changes were needed and that these changes required the faculty to obtain additional knowledge and clinical experiences if they are to be effective in accomplishing the changes.

The need to further develop the health assessment component was generally agreed upon by the faculty. There was agreement that this was a major component basic to primary care and that it should start at the sophomore level along with other fundamental nursing skills. However, planning and implementation was tackled only by a few of the more willing and adventurous faculty members. During the first year, the health history and physical assessment content and skills were developed for use by students during all three years of their clinical nursing. A major concern was to ensure that nursing students complete their baccalaureate program with a basic and solidly implanted comprehension of the primary care skills and functions that are in demand by consumers and agencies employing nursing personnel. As the refinement of this knowledge base of content progressed, it was determined that primary care concepts as a major component of distributive care should be



introduced during the sophomore year. During the second and third quarters of the sophomore year there would be emphasis on the developmental histories. Thus, course content and clinical learning experiences included communication and interviewing theory and methods deemed necessary to obtain critical patient information and accurately interpret the findings. The sophomore team is currently endeavoring to help the students to develop and maintain the nurturing qualities so important to nursing practice as well as to polish the characteristics essential in obtaining and analyzing data leading to a diagnosis. At this time the emphasis is on nurturance and helping skills, with competency in data assessment placed at certain points in the junior year and completed by student option and within psychosocial areas of the senior year.

The faculty's initial decision concerning implementation of primary care concepts in the curriculum was to broaden the whole area of health assessment throughout the program. This decision reflected student need for practice over a lengthy period and the knowledge that this additional practice was necessary for developing clinical judgment in the management of a therapeutic protocol. Basically, this content included concepts pertaining to health maintenance and promotion. Special content was organized for skill development in use of the health and developmental history interview, the health assessment techniques of observation, inspection, auscultation, palpation, percussion, use of specific tools for specific screening or diagnostic determinations, and some basic laboratory procedures in the areas of hematology, urinalysis, and bacteriology.

The first level of this content is currently included in the sophomore nursing courses. Specific content and learning experiences related to the health and developmental history interview and the physical examination of the patient are taught during the second quarter and throughout the junior year. Content and learning experiences related to examination and management of problems involving male and female genitalia, neurological assessment, cardiac auscultation, and use of the ophthalmoscope are delayed until the junior, or second, year of the nursing program.

Decisions determining the content and learning experiences to be placed at the sophomore level were based on a review and study of the performance evaluation of students for the previous year. The sophomore faculty eval-

uations of the student's understanding of the physical assessment component the previous spring seem to support the current sophomore level of content. The evaluation indicated that the students' overall skill in interviewing and examining the patient, and in utilizing the equipment was very smooth. In the initial phase, touching the patient to the extent demanded by the examination was very difficult for many of the students, but after three or four experiences it was generally not a problem. The students were videotaped doing a complete health history and a specific part of the physical examination as a part of their final examination in the spring quarter. The findings from these tapes indicated that cardiac auscultation was the single most difficult part of the examination for them, and that the students could do the neurological reflex testing but their understanding of the value of the testing was questionable. Students also tended to require more experience in the use of the otoscope than it was possible to provide. The faculty is currently reviewing the content in these specific areas of the physical assessment. Their questions relate to such issues as (1) how much does a baccalaureate graduate need to know? and (2) what is a safe level of practice for the baccalaureate graduate in the area of primary care? Content related to physiological function is presented in considerable depth at the sophomore level, with additional physiological content and clinical experiences provided for specific emergency and critical care problems at the junior level. In addition, during the sophomore year, content involving growth and development throughout the life span is presented by nursing faculty representing all areas of clinical specialization.

Student experiences with individuals from infancy through adolescence are limited to observer-participant situations in normal newborn nurseries, preschool child study laboratories, individual families, and various community agencies for children. Parent and child nursing content, as well as well-child health assessment and pregnant woman assessment is done in depth at the junior level.

The underlying knowledge base of beginning students in nursing is facilitated by their previous natural and social science courses and specific courses in the biological sciences. In addition to these basic courses, additional content related to normal physiology and pathophysiology of each system is studied in terms of major acute and chronic illnesses during the

second and third quarter of the sophomore year. Paralleling this content is the study of normal growth and development, interpersonal and intrapersonal communication skills development, and professional nursing roles and functions. Relative to primary care, students moving into junior year courses should have a basic understanding of health assessment, including use of health history and physical examination techniques and an overall understanding of primary care concepts and responsibilities.

The basic orientation of the junior level revolves around the family unit--parents, children, young adults; aging and dying are also included. Assessment related to the respiratory, cardiovascular, and neurological systems is expanded. In addition, human sexuality and health assessment related specifically to women and children are presented. The psychosocial component specifically deals with developmental problems associated with growing children and family crises arising when patients experience acute and chronic illness and maturational problems.

The emphasis in the senior year is on overall community health and on psychiatric/mental health in rural, acute, and long-term settings. In addition, students have experiences in a middle-management leadership position. Leadership, client advocate, and change agent skills are included as a strand throughout the program. The graduate should be equipped to give direction and support to individuals, families, groups of clients, and co-workers. Senior nursing students should not only do health assessments and diagnose problems of clients, but also should assume some independent responsibility for planning and managing the health regimen.

The weakest area exhibited by upper division students in health assessment is obtaining physical history information on eye and ear and the musculoskeletal system status. Content regarding the interpretation of laboratory findings, EKGs, major x-ray landmarks, suturing, and simple orthopedic procedures are tools of value to a nurse practitioner, but it is very difficult to provide large numbers of students with a practice arena. This year the faculty will attempt to provide both some content and experiences regarding EKGs and major x-ray landmarks at the junior and senior levels. However, they are concerned about the availability of learning experiences for more than a few students. Generally, there is an emerging belief among the faculty that experiences in health assessment such as the taking and interpretation of x-rays requires a level of preparation that

can be achieved only by those students who are able to have experiences with a physician or nurse practitioner preceptor. Students desiring to work as nurse practitioners require an extensive opportunity to experience personal accountability for a patient caseload. This currently does not seem to be a reasonable academic program expectation for more than 10 to 15 percent of the students in a class of 100.

A major problem with organizing the content is trying to refrain from developing an additive model. There is a tendency among nursing faculty to add physical assessment and problem-oriented records information and experiences to already heavily laden content areas with little attempt to integrate, or translate, their relevance to a total view.

A serious question remains regarding developing and maintaining minimal levels of competency in the overall processes of health assessment. Development of primary care nursing was one of the considerations that prompted the investigation to find new ways of providing students with clinical practice arenas to support their health assessment knowledge base by practicing with well, early-sick, or worried-well clients. Because students traditionally have learned to do health assessments using acutely ill hospitalized patients, a barrier is often created in learning the concepts of health maintenance and/or promotion. It is often difficult to provide or learn health assessment content and skills in an acute care setting where the need for in-depth pathology content and technical expertise focus the practitioner on "curing" aspects of the management program.

Faculty are trying a variety of approaches for offering content and clinical experiences related to nurse practitioner functions. One approach is establishment of two faculty/student-managed primary care clinics; they are being planned. The initial goal in planning the clinics was to provide faculty with an opportunity for them to develop and maintain essential physical assessment skills. The clinic experiences have quickly evolved into a faculty/student team-teaching approach to the processes involved in health assessment--that is, screening, problem identification, and therapeutic planning maintenance and/or promotion of health for patients. The clinics have enabled faculty not only to maintain their own competency in primary care but also to serve as validators in student learning situations.

Another approach to teaching the health assessment process has been nursing competency courses in in-depth content and clinical learning

experiences for senior students. These have resulted from considerable interest and demand by the students. The content areas represented in the courses were chosen because of student interest, availability of clinical settings, and availability of faculty with the needed expertise who were willing to conduct the courses. These courses are designed to expand the students' knowledge base and clinical expertise. They are specifically geared toward preparing graduates to function in areas where primary care is needed, valued, and required. Currently, there are clinical experiences offered in settings involving geriatric clients in an apartment complex, a group of manpower trainees, newborn infants, and ambulatory adult psychiatric clients. In addition, two courses in primary care are available, focusing on mental health and crisis intervention for adolescents and adults in rural settings.

The overall experience in determining the functions of a nurse practitioner at the baccalaureate level has enabled the faculty to realize more fully the need for students to have extensive experiences in assessing and managing the health regimens of a caseload of patients. The content and concomitant learning experiences providing opportunities to develop clinical judgment, accountability for decisions related to assessment, and planning and evaluation of the patient's overall health management program must be carefully identified. Development of these capabilities is essential if the baccalaureate graduate is to provide primary care to consumers. An additional difficulty lies in determining appropriate clinical settings and then establishing collaborative interdisciplinary relationships that will meet the students' needs related to the evolving focus on primary care and health promotion.

In summary, I have attempted to describe the health assessment content as it exists in the undergraduate curriculum at the University of Utah. Initially, curriculum change and development are always fraught with difficulty, but the faculty are now at a point where they are fairly comfortable with the health assessment component, although they are still uncertain in many ways about succeeding steps necessary for complete incorporation of the primary care concepts. It is hoped that continued development of nurse practitioner functions and skills relative to primary care at the baccalaureate level may facilitate further refinement in the graduate education program



offerings. Certainly, this continued struggle to improve curriculum offerings for baccalaureate nursing may ultimately more nearly meet the requirements both of consumers and health care professions.

HEALTH ASSESSMENT IN THE  
BACCALAUREATE PROGRAM FOR REGISTERED NURSES  
AT CALIFORNIA STATE COLLEGE, SONOMA

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Health assessment is a dominant behavior in the nursing domain. How it is defined, operationalized, and taught will depend on the unique circumstances that provide direction for individual curricula. Placement of health assessment in the curriculum and selection of teaching strategies used to develop health assessment behaviors in the baccalaureate program for registered nurses at California State College, Sonoma, reflect the unique configuration of the conceptual framework for the curriculum.

I would like to describe briefly that conceptual framework so that the rationale for decisions about inclusion of health assessment will become clear. The theoretical framework utilizes the model proposed by Dr. Shirley Chafer (2): this model is composed of the setting, the characteristics of the learner, and the faculty's hypotheses about the nature of nursing as a discipline and its requisite knowledge.

California State College, Sonoma, is a small liberal arts college, which accepted nursing as its first professional program in 1972. The campus is located in a farming community, with the six surrounding counties designated as the service area of the college. Five community colleges, all with associate degree nursing programs, constitute the only nursing programs in the service areas.

The six-county service area of the college contains a wide variety of geographic characteristics and life styles. Examination of the socio-cultural milieu defines the dominant health care needs in this college service area as those associated with a widely diverse but stable population; the area ranges from urban/metropolitan to rural; it is suffering some growing pains, and is expecting increased population pressures, especially from an increase in the proportion of minority groups and in the very young and the very old. Acute care, ambulatory care, and public health and social services represent the major health care system.

Analysis of the factors that describe the setting provided a basis for curriculum content and learning experiences that had high relevance to real problems and served to define the practice setting parameters for implementing professional practice. The abilities, background, interest, motivations, expectations, and potentials of the students, along with faculty hypotheses about how students learn, constituted the second major component of the conceptual framework for curriculum decisions.

All students admitted to the program hold a current California license as a registered nurse and have earned an associate degree in nursing or its equivalent.

Descriptions of the students in the Second Step Program, determined from data collected on three entering classes, have served to formulate faculty's assumptions about the characteristics of the students. A brief summary of the data described the average student as a white female, 32 years old, married, with two dependent children at home. She commutes an average of 26 miles a day to school, has received her basic education in nursing in an associate degree program, and has an average of six years of clinical experience in a hospital setting. Her reasons for returning to school are varied and include job promotion, change in work setting, and a desire for professional, personal, and intellectual growth. Most probably, she will finance her education through employment as a registered nurse.

The majority of students reported their practice had been in hospital settings with medical/surgical nursing, the most frequently reported area of concentration. Only seven students reported any actual nursing experience in the community.

Significantly, the characteristics of the entering student in the Second Step Program embrace some fundamental considerations concerning strategies that will influence learning. Theories of Knowles that describe the art and science of helping the adult to learn provided a basis for the development of teaching strategies for this unique group of students (4). Implicit in the assumptions of androgogy is that the characteristics of the adult learner are different from the characteristics of the child learner.

Knowles stated that as a person matures: (1) self-concept moves from a dependent personality toward one of being a self-directing human being; (2) a growing reservoir of experience accumulates that becomes an increasing

resource for learning; (3) readiness to learn becomes oriented increasingly to the developmental tasks of social roles; (4) time perspective changes from one of postponed application of knowledge to immediacy of application, and, accordingly, orientation shifts from one of subject-centeredness to one of problem-centeredness (4).

The self-directing personality of adults emerge as they take on the status of doers or producers in society. Each time they experience success in endeavors, evaluation of self and goals increase. They begin to recognize and have confidence in capabilities and self-worth. Registered nurse students particularly resist learning situations that negate their self-concepts as experienced practitioners. Having to repeat basic nursing courses is a particular affront to them. They view this policy as a negation of their accomplishments in the practice of nursing.

Androgogy places a great emphasis on self-diagnosis by the learner of personalized learning needs. Knowles outlined this process as developing in three phases. The first phase, he wrote, is to give students a clear description of expectations and a model for fulfilling the expectations. The second phase is to provide students with experiences that allow them to assess their present level of competencies and compare them with the model. The third and final phase is to help students measure the gaps between their present performance and that required in the model. Knowles felt that once the students have identified their learning gaps, the students become dissatisfied. Having established a clear idea of the goal, their sense of dissatisfaction motivates them to search for the means of achieving their goal. The faculty believe a curriculum that encourages students to plan and implement their own learning experiences exemplifies the concept of maturity and self-directedness.

The curriculum design was depicted as a systems model that provided a basis for decisions about the significant concepts, processes, knowledge, and skills germane to our definitions of professional nursing. Use of this particular model also allows for continuous feedback on which evaluation and change can be predicated.

In the Sonoma model, professional nursing is defined fundamentally as an interpersonal process, the goal of which is to assist persons in the achievement of optimum health. A set of subprocesses composes the professional nurse's unique repertoire of interventions used in her practice with clients. These subprocesses include: decision making, change, communication,

self-actualization, teaching/learning, and research or inquiry. According to our model, the nurse/client relationship can be established with individuals of all ages and in all phases of development. The client can be an individual, family, group, or an entire community. The professional nurse encounters the client in both episodic and distributive practice locales, and the client may be at any stage of contact with the health care delivery system.

In the process of assisting the client toward optimum health, three valued nursing behaviors occur: assessment, intervention, and collaboration with other health team members. The faculty specify accountability, broad scope of practice, and scholarly concern as three essential properties that characterize the professional.

Two of the major goals of the program are directly related to the development of health assessment skills and knowledge. The Second Step baccalaureate program in nursing aims to produce a nurse who: (1) has a broad knowledge of the health-illness continuum and the factors that affect clients, families, and communities as they move through the continuum; and (2) uses a systematic problem-solving approach in assessment and analysis of health problems and in planning, implementing, and evaluating nursing interventions.

In order to operationalize these two broad, general objectives into curricular components, the faculty chose to define their terms as follows:

1. Health-Illness Continuum

A framework for viewing man in health as well as illness. Inherent in the continuum of health is the "wellness continuum" which emphasizes the constructive attributes of characteristics of an individual rather than the negative disease condition. The wellness continuum allows one to consider how successfully the individual is functioning in spite of health stressors, whether it is sociologic, physiologic, or psychologic in nature (1).

2. Concept of Health

Dunn (3) conceptualized health on a continuum with wellness considered as a dynamic condition of change toward a higher potential of integrated biopsychosocial functioning within the ongoing and changing environment.



### 3. Assessment

Assessment is a process which involves the sorting and analyzing of data, making decisions about the importance of the data, relating the data to standards and norms, and finally making decisions about the need for intervention. This involves formulating inferences, validating the inferences, and making a diagnosis.

The concept of health assessment is an integrative thread of the curriculum and continues to be defined, expanded, and nourished in all of the courses in the nursing major. The concept is extended to embrace the individual, the family, the community, and institutions representing the health care delivery systems. It involves building a knowledge base about the structure and function of the system being assessed, developing a basis for analyzing and diagnosing each system's placement on the health-illness continuum, and being able to communicate the findings systematically and accurately in language that conveys to other health professionals the exact picture of the health assessment.

Organization of curriculum and selection of teaching strategies express the faculty's operationalization of the concept of health and the skill of assessment. Decisions about the knowledge base, learning experiences, and teaching strategies were derived from knowledge about the learner, analysis of the educational and practice setting, and from the definitions of professional nursing practice. Implementation of health assessment in the curriculum is described in terms of program placement, sequence of concept development, learning experiences, and teaching strategies.

#### First Program Year

##### N310.A Community Health Nursing

Health Assessment Focus: The concept of the health-illness continuum is introduced. Theories that apply to the physical, psychological, and social variable of health and illness of the individual and the family in the community setting are taught. Assessment and decision-making criteria are formulated.

Teaching Strategy: There is one hour of didactic presentation and a one hour seminar. In the small group seminar, students are guided through the process of application of theoretical concepts to problems in practice. Role playing and simulated practice problems are used.

#### N 311.A Community Health Nursing Practicum

Health Assessment Focus: Health assessment of individual and families carried as clients by the student is a primary focus. Integration of theory from concurrent courses as it applies to health assessment and in incorporating physical exam skills into the practice setting is taught. POMR recording and oral case presentations of assessment findings are introduced.

Teaching Strategy: Clients are assigned who are representative of problems at primary, secondary, and tertiary levels of prevention in meeting health needs of individuals and families in the community. Assessment guides are provided to students to clarify their beginning practice. Case presentations, peer consultation, collaboration with health team members are included.

#### N 310 B. Community Health Nursing

Health Assessment Focus: Assessment of existing systems of health care delivery and of the community in relation to health needs and available resources designed to meet these needs is presented.

Teaching Strategy: Students work in small groups to compile a profile of the community and prepare a written analysis about the community, which describes the effects of components in the community on the health care of families.

#### N 311 B. Community Health Nursing Practicum

Health Assessment Focus: Students continue to have supervised clinical practice with selected groups of clients whose problems are varied and complex. Community assessment and involvement in community planning around identified health problems is incorporated into practice.

Teaching Strategy: Students develop health assessment guides for assessing multiproblem clients and families. They become actively involved in community health planning groups.

#### N 315. Science Principles Applied to Human Phenomena

Health Assessment Focus: The student develops a knowledge base of the normal range of physiological function and the processes of physiological dysfunction. The course stresses assessment of the individual's level of function through application of physiological principles and concepts.

Teaching Strategy: Case studies are provided with each unit of study. Students complete a case analysis based on subjective data, objective data,

assessment, and a plan of care.

#### N 316. Physical Assessment

Health Assessment Focus: The course focuses on development of assessment skills used to determine the physiological status of the individual. Students demonstrate mastery of the knowledge base underlying the technique and skill of physical examination and proficiency in examination skills. Written descriptions of the physical findings complete the triad for health assessment of physiological functioning.

Teaching Strategy: Units representing components of physical examination skills are modularized in self-pacing learning packages. Pretests assist the student in determining individual learning gaps by measuring the student's knowledge against the learning objectives accompanying each learning package. Students select the learning activity that is most compatible to their own learning style. Proficiency is demonstrated by scoring at a designated level on post-tests for each unit, showing skill in the laboratory setting, and recording physical findings appropriately.

#### N 302. Microteaching for Nurses

Health Assessment Focus: The course develops a theoretical basis for assessing the learning needs that relate to prevention and health promotion.

Teaching Strategy: In a simulated classroom setting and with the use of videotape and peer and learner evaluations, students are assisted in determining the degree toward which learning needs have been clearly defined and met.

#### N 367. Interaction and Change

Health Assessment Focus: The course develops an awareness of the individual student's interaction style and emphasizes the broad concepts of communication. It assists the student in assessing patterns of communication as they relate to the psychological functioning of individuals, families, and groups.

Teaching Strategy: The course provides experiential learning through group process, peer counseling, and keeping a personal journal.

#### American Ethnic Studies: Health and Culture

Health Assessment Focus: Parameters are developed for assessing ethnic attitudes toward nutrition, physical and mental health, and the influence of cultural differences on health behavior.

Teaching Strategy: Students meet in small-group seminars that allow each group to develop in depth the culture patterns of one major ethnic group represented in the American population.

At the end of the first year, the student understands the process of assessment and is able to assess the physical processes that predict the health-illness status of the client; the major patterns of psychosocial behavior in clients, families, and community; and the cultural variations that affect health-seeking behavior. The student is also able to communicate health assessment findings appropriately and accurately on a POMR and in scholarly written case presentations and oral reporting.

The senior year engages the student in preceptorship study. Each student defines for herself an area of interest within the broad scope of nursing. She delineates a program of study by assessing her own needs, defining goals, selecting learning experiences to meet and implement those goals, and outlining the evaluation process for determining the results. The student formulates a contract for learning through preparation of a written agreement that includes selection of a practice area that is representative of desired learning experiences, a preceptor, and a faculty advisor. The field preceptor supervises and guides this student's clinical or field experience, and the faculty advisor facilitates the total experience as counselor, consultant, teacher, and/or as co-worker, group leader, or tutor. Student, preceptor, and faculty advisor collaborate in planning, implementing, and evaluating the contract for learning.

Although students are free to define preceptorship study to meet their special interests and needs, they are obligated to include behavioral objectives that will meet the broad objectives of the senior year and the terminal program objectives. Therefore, every contract reflects the continuing development of knowledge about the health-illness continuum and of the assessment process. Each student interprets these objectives in light of her unique circumstances, setting, and client population.

In addition, students complete a course in management, which focuses on the planning process. A preceptorship seminar carries a health assessment focus when students assess the organizational structure and functioning of the health care delivery systems representative of their preceptorship placements as they relate to the fostering or inhibiting of professional practice.

Examples of some areas of preceptorship study reflect the various ways students continue to develop their understanding of the concept of health assessment and refine assessment skills. Some students select the family nurse practitioner option for senior year preceptorship, others elect to develop nurse practitioner skills in areas that will be an integral part of their practice, such as pediatrics, family planning, or obstetrics and gynecology.

Teaching preceptorships in the associate degree nursing programs or LVN programs allow an opportunity for students to translate knowledge and skills of health assessment into a teaching/learning format. Preceptorships in an acute-care facility require students to transfer skills learned in a distributive setting to the assessment of critical and rapidly changing health states. One student who is working with staff caring for emotionally disturbed adolescents in resident settings finds herself concentrating on assessment of psychological behavior to determine effectiveness of treatment plans.

Students share experiences in health assessment in preceptorship seminars, which provide opportunity for continually enlarging their concept of health and the process of assessment.

By the end of the senior year, each student will have developed a broad concept of health assessment. She will have developed criteria for health assessment of a particular population and will have developed beginning expertise in moving through the process of assessment within her defined area of study.



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## THE NURSE PRACTITIONER: GRADUATE LEVEL

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In 1965, when the University of Colorado Schools of Nursing and Medicine initiated the first Pediatric Nurse Practitioner Program to help nurses expand their roles in ambulatory pediatric settings, I was a member of the second class of the program. At that time the program was conceived of as an experiment in the "expanded role" of the nurse. It was considered as such because we were uncertain as to whether nurses would be able to expand their role in this way, whether they would consider it "nursing," whether the physician would accept this role, and whether the patient would accept it. It was considered "expanded" because it included functions which, at that time, were not considered the accepted role for nurses. During the intervening ten years, many practitioner programs have been initiated nationwide in pediatrics and other specialties, various methods of preparation have been tried, various types of content have been included, and various settings of employment have been used. Studies have been done concerning the acceptance of the role by the physician and the patient, and much discussion of the acceptance of the role by nursing has ensued.

We have reached the point at which the experimental phase of this concept is over, as is the idea that this is an "expanded role". It is clear now that it does work. In general, both physicians and patients are satisfied with it, and most of nursing has accepted this as the primary role of the nurse in the ambulatory setting. No longer is it to be considered an "expanded" role--it is now thought of as the role of the nurse in the ambulatory setting.

In order to carefully assess the results of this project on role expansion and to make reasonable judgments concerning its incorporation into the undergraduate and graduate programs, the University of Colorado, along with other schools, applied for a grant with which to plan and begin such integration. The grant has been in effect for one year, and plans, although still tentative, have been started, and actual integration is scheduled to begin next fall.

The task force appointed to work on this grant has been involved with content delineation on both graduate and undergraduate levels. Although there is some agreement on the undergraduate level, there has been less discussion on the graduate level, so the ideas presented here involving that level are basically my own.

The content emanating from the practitioner movement seems to me to fall into three hierarchical levels: the basic or undergraduate level, the transitional undergraduate/graduate level, and the graduate level. Although my emphasis is on the latter two levels, an understanding of the first is necessary.

#### Basic (Undergraduate) Level

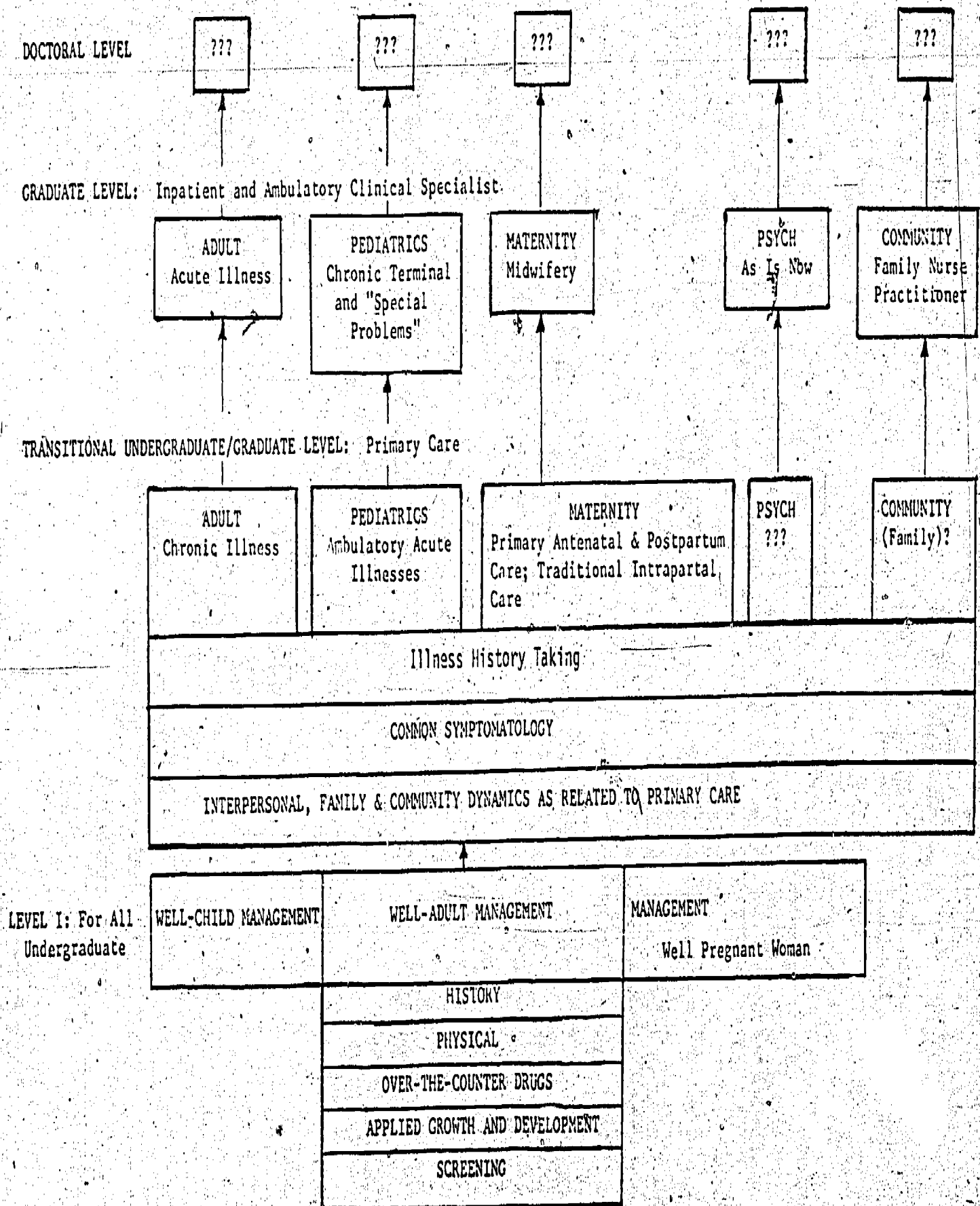
This level consists of content that has evolved through the practitioner movement, which I think is relevant to all nurses in all settings, and which could really be taught to all undergraduate nursing students. It consists of eight components (see Fig. 1), five of which are core to all specialty areas, and three of which are specialty-specific. The core areas are health history taking, physical examination, screening; over-the-counter drugs, and applied growth and development. The specialty-specific areas are well-child management, well-adult management, and management of the well pregnant woman. The details of these components are now being worked out by the task force. It is possible that two of these areas (applied growth and development and over-the-counter drugs) may have to be moved to the next level of content after further exploration. Much emphasis on preventive mental health is woven into the applied growth and development, well child, well adult, and well pregnant woman components. Psychiatric content as such, however, has not been pulled out as a separate component.

This level was briefly considered a transitional graduate/undergraduate level. That is, we tried it out as a graduate-level course in the pediatric and medical/surgical graduate departments, after which we decided that it was definitely undergraduate content. It is now offered as a summer prerequisite to the practitioner tracts.

#### Transitional Undergraduate/Graduate Level

This second level of content seems to me to where the first level was a few years ago. In other words, now I think it should temporarily be considered as a graduate-level content. Within a few years, however, it will probably be moved into upper-level undergraduate work (either as the last semester

Figure I  
LEVELS OF PRACTITIONER CONTENT



elective or part of an internship). There is some core content to this level-- specifically, illness history taking; common symptomatology (for instance, the understanding of how to evaluate gastrointestinal symptoms in either child or adult); and interpersonal, family, and community dynamics at the introductory level, particularly as they relate to primary care issues such as compliance and patient education. I think this level is primarily an ambulatory care one, to be considered comparable to the inpatient options of specialty that already have been highly developed, such as intensive-care nursing or other inpatient specialties. The specific content in each area is listed below.

Pediatrics: In this area, I think the specific content relates mostly to primary care for ambulatory, acute illnesses of children. History taking for the sick child, adaptation of symptom analysis, and physical examination would be specific to the various age groups from the newborn period to adolescence. Understanding of acute illness as it affects interpersonal, family, and community relations is relevant. Skills in well-child management are enhanced and new dimensions added. A more sophisticated knowledge of preventive mental health measures in terms of handling acute care situations through appropriate family counseling and use of educative and cathartic play communication with children would be important.

Maternity: The basic foundation of increased accountability for antenatal management is refined. More sophisticated understanding of the influence of childbearing on personal, interpersonal, familial, and community relations would be important. The intrapartum period would remain supportive, although increased ability to apply such concepts as crisis intervention would be emphasized. A very intensive expansion of knowledge in relation to the postpartum period would be important. This would include an expansion of the physical examination to include a bimanual and the knowledge and skills necessary to act as a primary care giver in relation to family planning measures (for example, insertion and removal of IUDs, fitting diaphragms, and starting and changing women on the pill). Appropriately, increased understanding of compliance and appropriate teaching/learning methodologies (for individuals and groups), would be part of the curriculum at this point.

Adult: This would include increased skills in management of patients with relatively stable chronic problems such as hypertension, diabetes, and obesity. The rationale for this difference from pediatrics, in which chronic



problems are not handled until the third level, is that chronic problems in adults tend to be physiologically and psychologically reasonably stable compared to problems in children." In children, the tremendous physiological changes of growth and the constantly changing family dynamics require a much more sophisticated level of care.

Psychiatric: I am uncertain about this area. The role of the primary care giver in psychiatry has traditionally been reserved for the graduate level, but perhaps some increased role expansion--possible as a cotherapist rather than a primary therapist--might be appropriate here.

Community: The question of a family nurse practitioner arises; it is a very troublesome one. For practical reasons, I do not think it is feasible at this level, but I am not sure. The questions are, How do you fit the necessary learning experiences for all age groups as well as a reasonably sophisticated understanding of family and community dynamics into this amount of time with limited or no experiential background? and Can you expect a graduate of this level to keep updated on all these areas for the rest of her professional career? Perhaps this would be an option only for registered nurses with a very strong base.

#### Graduate Level

This is a level that I visualize as a broadening of what has always been considered the graduate level of clinical education--the clinical specialist. Traditionally, however, clinical specialists have functioned primarily in hospitals. This level broadens that concept to include ambulatory care and combinations of inpatient and ambulatory care, but for very specific populations that require particular expertise.

Pediatrics: At this level a nurse might choose to specialize in the traditional areas of inpatient clinical specialties such as high-risk newborns, but she might also choose to specialize in ambulatory settings that require a high degree of sophisticated expertise: genetic counseling, learning disabilities, chronically ill children (such as children with asthma and cystic fibrosis) and terminally ill children who are ambulatory (such as oncology patients). In some cases, such as terminally and chronically ill children, nurses might work with both inpatients and outpatients.

Maternity: I think the graduate level of maternity in practitioner terms is the midwife; however, because of the preceding in-depth preparation

prenatal and postnatal primary care, more time could be allotted to high-risk patients (not as primary care giver but as a clinical specialist with expertise in the physical, psychosocial, and cultural implications of high-risk child-bearing).

Adult: At this level, the nurse would be prepared to become a primary care giver for individuals with acute illnesses. This would be mostly an ambulatory role. Again, the order of Level I and Level II is reversed between adult and pediatrics for reasons explained above.

Community: This is probably where the family nurse practitioner is possible. Increased skills in primary care to all age groups, as well as more sophisticated understanding of family dynamics and community assessment and change, are also important.

Psychiatry: It seems to me that the clinician currently prepared, at least as I understand the concept, is already giving primary care to patients. At this level I do not foresee any changes.

#### Doctoral Level

In a recent article, Dr. Loretta Ford mentioned the possibility of a doctoral level in practitioner work. I have not thought this through completely but I believe it should at least be considered as a possibility. The idea holds exciting potential.

This, then, is the tentative outline that seems plausible to me. It is certainly not unalterable, but it seems like a reasonable starting point from which refinements could be made. I hope that a variety of experiments of this and other models will take place over the next few years, and that from these data, sound decisions concerning the place of primary care nursing in the curriculum will emerge.

# INNOVATIONS IN NURSING CURRICULA

San Diego, California

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